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THE SAIER CATALOG OF

RARE AND POPULAR FLOWER SEEDS VEGETABLE AND GRASS SEEDS

GARDEN BULBS- ALL KINDS

PIONEER SEED COMPANY

OVER 4,000 SPECIES & VARIETIES

GARDENER'S SUPPLIES

DIMONDALE, MICHIGAN, U.S.A.

Since 1911

NOVEMBER - 1948

Monthly — Number 48-6

In The Mail

We have been unusually busy the last two months, so much so that we have not been able to get the material ready for the last month catalog. Lily bulbs as well as other fall bubs have been coming in and orders filed as they arrive. The one disagreeable thing is the Lily bulbs. First, buyers expect the American grown bulbs to be as large as cabbages but they are not, in fact the American grown stock seems to be smaller than the foreign grown bulbs and to be added to this draw back, we seem to have a lot of trouble in getting size from American growers. We get more complaints on Lily bulbs in a months time than in our seeds in several years time.

We especially call our readers attention to the growing of Lily bulbs from seed; it is a simple undertaking, and a lot of bulbs can be grown from a few cents worth of seed. Furthermore, if well grown, you will get good bulbs of flowering size a lot sooner than most people will lead you to beieve. The next best move towards planting, which can be done inthis is to get seed for early spring planting which can be done indoors in pots or flats, starting them as early as Jan. In the South they can even be started outdoors.

DRIED HERBS WANTED. The Herb and Garden Shop, Box 155, Williamsburg, Va., wants dried herbs and any of our readers having any surplus should get in contact with them. By theway, we will have our complete herb seed list in the Dec. issue; this will consist of over 50 kinds.

WILLIAM F. TILLEY of New York wants information on Alternanthis, wewould like to have

someone growing this write us.
CHIRITA. Many customers
grew this this year and Mrs. Frank
McKay of Port Orchard, Wash. kindly reports as follows: The seed was planted June 2nd, came up in less than 2 weeks (used a magnifying glass) and now (Aug. 19th) they have their 2nd and 3rd pair of leaves but still are miniatures. I use a layer of sand and peat in bottom of seed jars then a layer of baked leaf mold for the seed bed, moisten carefully and then sprinkle the seed on top, pressing them down gently and keep in a warm shady place. I find this method fine, also for Saintpaulia, Gloximias, Primulas and Petunias.
MRS. WILLIAM JACKIE write

about the Gesneria Family of plants and especially asks about Alloplectus, Naegelia zebrina, Trichosporum lobbianum or tricolor and Episcia fulgida. Are any of our readers growing any of these?

FROM INDIA. A customer from India write in to inform us the Clerodendron squamatum is a shrub, 2-5 ft. tall bearing panicles of scarlet flowers, it is a widely grown tropical plant. Also that Hedychium coccineum is 1 foot spikes instead of 1 inch, and that we miss H. gardeneri, a fine species that should be grown in every garden. We are glad to say, too, that we have this seed for this season. We thank this reader for

these corrections and suggestions.
BELLS OF IRELAND. And while talking about corrections, Mrs. A. Rasmussen of Edgewater, Wis., write us about our listing Moluccella as "Bells of Scotland." Well, Mrs. Rasmussen, there be-

Gesneriaceae

Requests have come from many readers of this catalog for further information regarding, and offerirgs of, gesneraceous plants. In spite of the beauty of the florists' Gloxinias, the family never became popular until Saintpaulia, the African Violet, caught the fancy of plant lives. Apparently many beautiful kinds were grown in greenhouses a century ago, and more recently such Asiatic collectors as Forrest and Farrer sent back Boea, Didissandra, Roettlera and other gems. Where are they now? Styles change, and with the passing of the British bulb enthusiasts a great many treasures disappeared from cultivation. Today, no catalog lists seed or plants of most, nor can they be found in the exchange lists of the most comprehensive botanic gar-

Pioneer is doing its utmost to make available once more these elusive treasures, but at present has been able to obtain seed of only the following: Chirita, Ramondia, (currently Ramonda is the preferred spelling), Saint-paulia, and Streptocarpus. Orders have been placed with collectors in India for other sorts, which it is hoped will be available by next spring. Achimenes are grown a limited extent, and we hope for a supply for spring planting. But there are still many kinds that at present are little more than names to us, all of which are well worth (Continued on Page 23)

Campanulas

We are very sorry to have overlooked the credit to the very nice article in the August issue or Campanulas which was written by Mr. Robert M. Senior of Cincinnati

Mr. Senior is probably the best authority on this genus, in the country and his garden of Campanulas must be very complete.

By the way, the Quarterly Bul-letin of the Alpine Garden Society which has been recently received, contains a very good article by Mr. Senior on Annual GLAUCIDIUM. (Ranunculaceae) which may be Campanulas of Syria and Palestine. Some 8 species are listed and LEITNERIA floridans. American

A Heather Garden

The hardy Heathers, which are mainly of European origin, can, with care, be readily grown from seed. Most of them have a long flowering period and it is possible to have a Heather garden with flowers for every month in the year except in the coldest dis-

In Europe, the white form of the common heather, CALLUNA vulgaris alba, known as "lucky white heather", is largely grown for use in bridal bouquets and for wedding buttonholes for the

Heathers are a source of honey for bees and heather honey is greatly esteemed as an article of

I can only give you details of the method of culture I use and this could doubtless be modified for use in the various sections of

I use "John Innes" seed compost (omitting the lime). The seed is mixed with 10,000 times it bulb with clean sharp sand and sown on the surface of the compost in a frame facing the west. The frame is kept shaded during (Continued on Pres.

Seeds and Bulbs

contacting anyone having the following in seeds or bulbs. If located at any great distance please state strains and any other matter pertaining to their description and growth that would be of interest. Also quantity of seeds available. VALLOTA speciosa (Scarborough

Lily) or other species. AMARYLLIS belladonna BRUNSVIGIA josephinea or other

species
HIPPEASTRUM species. BRUNSVIGIA gigantea LYCORIS species, especially L.

radiata and L. aurea. IRIS kaempferi. Leontice (Berberidaceae), any species, 2 are listed as Bon-

gardia and Gymnospermum. Aceranthus, 3 species, Japan al-

China and Japan. (Continued on Page 21)

Fall Sowing Of Seeds

During the heat of summer, enthusiasm for gardening often lags, to return with the cool days of early fall, There is much work to be done at this time, removing the weeds for which one could not summon energy on blazing August days, planting the Dutch bulbs and the Lilies, as well as the beared Iris if this was done on schedule, moving shrubs to more suitable positions, and a host of minor details which will help to avoid the spring rush.

A little time should be taken for sowing of seeds, some of which must be planted in fall, while others will do quite, or nearly, as well as if sown in spring, and in addition will be stronger and better able to survive the summer. A well-worked nursery bed, in some out-of-theway spot, will be satisfactory, especially for the larger seeds it will pay, however, to nail four boards together into a rectangle, to make a cold frame, even a rough one; if a hotbed sash or old window is available to place over the top, very yell, but wire cloth will serve about as well, and is far less expensive. latter may be simply tacked over the frame, not to be removed until fairly settled spring weather, We are especially interested in but if glass is used, it should be removed during freezing weather to allow the full effect of snow and cold on the seeds.

Seeds for fall sowing fall into two classes. The first, comprising those that will not germinate before spring under any conditions. may be sown as soon as the seed is obtainable. Others, which may take a fancy to coming up during a warm spell in late autumn, should not be put in the ground till the latest possible moment, normally November; one does, of course, run the risk of an unusually early winter which will prevent such late sowing, in which case the seeds must be held over till

early spring.
SEEDS WHICH WILL NOT GERMINATE IN FALL, and which may be sown now, include

> Most Anemones Calochortus Clematis Crataegus Daboecia Dicentra Dictamnus Fritillaria Helleborus Ilex Iris

Aconitum

Lilium candidum, giganteum. jankae, martagon and its hybrids, macrophyllum, Mrs. Backhouse hybrids, pryenaicum, szovitzianum, washingtonianum, Thompsonianum

Magnolia Nomocharis Paeonia

Penstemon barrettae, cardwelli, fruticosus, linarioides, montanus

Phlox paniculata Tulipa

Other hardy perennials and shrubs are best delayed until the last possible moment before the ground freezes; most of these will not germinate in fall, but as the germination period is variable, it is wisest not to take a chance, es--Dr. C. R. Worth

A German Letter

Dear Mr. Saier:

"My heart leaps up when I behold a rainbow in the sky" This wonderful poem always touches me when I experience something exceptionally beautiful. For me as a gardner, who loves nature, it may be a single bloom or a fine Campanula, a Lily or a Penstemon in a clearing in the woods, flush lighted by the sun's rays against the dark green background but also equally, a fine setting of flowers by the gardeners hand.

Why not revel, if the Mance is given us, in colors and scents as in the big flower shows of nature, such as the Crocus meadows of the Alps, the palms of Elche in Spain, the Lotus flowers in Indian waters and so many other festivals of nature Heaven seems to have blessed these latitudes with preferences and the wanderers reflections stand also above business interests if he sees first the glorious bulb fields of Holland the rose fields (for attar) in Bulgaria, The Daffodills in Devonshire, the Mimosas and Carnations on the Riviera and last but not least, the flower fields of the big centers of seed growing in Germany.

I have just returned with my daughter, who is our hybridist, as you know, from a walk over those nearly endless stretches of flowers here and one can be really enthusiastic with each repeated visit -the vast carpet varying almost daily in color. Every day a new kind of flower opens its bud here; there is always a "rainbow in the sky," reflected on the surface of the globe. We gardeners here know that you have also wide areas of flowers in California and they must be a marvellous sight too. They differ from ours as the summers here are cool and rainy so that we do not need irrigation. The climate is rather rough and the thermometer often shows subfreezing degrees in mid-May and approaches freezing point also in June. But the plants are hardened, there is no luxurious growth, but a slow sturdy one; seeds ripening (Continued on Page 23)

The Apline Garden

One of the most outstanding of horticulture organizations, the Alpine Garden Society of Great Britain, has as its purpose encouraging the introduction of and interest in, plants suitable for cultivation in rock and alpine gardens, alpine houses and frames.

It publishes a Quarterly Bulletin of about 80 pages, very handsomely illustrated, which is indispensable to the rock gardener. Cultural notes, photographs of fine specimens, and accounts of plant collecting expeditions are some of its features.

A Panel of . Experts answers questions regarding difficulties encountered by members. A feature of interest to visitors to the British Isles is a series of shows held yearly, exhibiting the newest and finest in alpine plants.

Membership in the Society is \$4 per year; new members subscribing before the end of the year will receive in addition to the 1949 Quarterlies, that for December

To subscribe to the Society, or pecially if the seeds are rare and for further information, address Dr. C. R. Worth, Groton, N. Y.

Calceolaria Dippes Pansy-Flowered

New Double Pouched Introduction

We are pleased to introduce the new double pounch Calceolaria named "Dippes Pansy-flowered". There has been no other calceolaria with double bloom before. In 1942 when this Calceolaria was first produced in Germany the upper part was still small but since has been enlarged so that now it produces sensational blooms. The upper pouch equals in size the lower one and even surpassing it.

The new flower gives the impression of a Pansy with the aureola along the rim of the upper pouch and its large blotches on the lower This new feature is increased by a brilliant display of fascinating colors with red and yellow predominating. There are also other odd markings that will attract attention. The present offering is in spotted and blotched varieties mixed and next year will be offered separarately. Large packet, \$1.00.

CULTURAL DIRECTIONS: Sow Calceolarias from July to Sept. for florist use, but for the individual, they can be started later as time of blooming is not so important. The seed being very fine it is recommended to sow very thinly and to mix the seed with fine sand and not to cover the seed after sowing. Keep seed pan moist and warm, with a pane of glass over it. After sprouting, prick off and plant in small pots. Shift them once again and winter them over inside; Well, Mrs. Rasmussen, there being 14 Scotch in me, I probably
thot "Scotland" in stead of "Ireland" but that will be corrected, to
be sure, for Ireland it is. In her
(Continued on Page 21)

plant in small pots. Shift them once again and winter them over inside;
in early spring shift to larger pots. They prefer an airy and shady
place for blooming freely, if possible in the open (which is possible in
late started seed), protected from rain and too muck early They bloom
in about 8 months. They are easily grown in the plants be to March,
you can bring them to bloom took garden doing best in rich

ABIES (AY-bi-eez)

ABES-1. Pkt. 30c The needles are 1-2½ inches long, flat and silvery on the lower side, cones cylindrical, 6 inches long; a Himalayan tree from India

ACACIA (ah-KAY-shah)

ACAC-2. Pkt. 50c ---constricta. Ornamental shrub with numerous yellow flowers, native of Texas.

-raemeriana. ACAC-4. Pkt. 50c -torulosa.

ACHILLEA (ak-i-LEE-ah)

(Milfoil or Yarrow). Hardy herbaceous (Milfoil or Yarrow). Hardy herbaceous perennials easily grown in any good soil and sunny location, flowering from June to Aug. or later. Flowers in clusters of small heads, white and yellow very good as cut flowers. Seed planted indoors in March or early April and set out doors early in May, have good chance to flower first season. Seed also can be started out doors in May or June, setting out in garden in Sept, or Oct. for next year's flowers. Set plants 1 ft. apart; heights 1½-3 ft. Bone meal around plants in spring is good.

—chrysocoma. ACH-4. Pkt. 25c Dense woolly foliage and bright yellow flowers; HP, 9 inches. ACH-4. Pkt. 25c

—filipendulina. ACH-5. Pkt. 25c A showy, tall species of robust habit, large yellow corymbs, HP, 5 ft. ACH-5. Pkt. 25c

—millefolium. ACH-6. Pkt. 25c
The native Yarrow of England, with round heads of white flowers, HP, 2 ft. tall, June-Sept.

——Carise Queen. ACH-7. Pkt. 25c A beautiful Milfoil with rosy-cerise flow-ers. HP, 2 ft. A beautiful bright colored Yarrow, HP,

ACH-10. Pkt. 20c c.ear yellow flower heads, excel-uiting; prefers dry place, ever-

plantage of pl., The Pearl. ACH-3. Pkt. 15c; 1/4 oz. \$1.25

ACHIMENES (an Town-e-neez)

Tropical American plants usually grown Greenhouses for their showy flower and can be planted out in the garden during the summer; thick tuberous roots loxinia-like flowers in red, white an iolet, etc. Start seed early indoors under the conditions.

-Finest Mixed. ACKM-1. Flt. \$1.00

ACONITUM (AK-oh-nyt-um)

Thin to 18 in. apart when well started. Transplanting should be done in Sept. Bene meal is good fertilizer.

ACD-1. Pkt. 20c Blue flowers $2\frac{1}{2}$ in. across, found Him playan pastures up to 15,000 ft., HP.

ACD-3. Pkt. 50: Hindsome spikes of very large, porce-lain blue flowers, late, very fine; HP, 3 ft

— Barker's Variety. ACD-2. Pk. 60c
A Leautiful novelty in an amethyst-blue color, HP, 6 ft. tall.

ACROCLINIUM

(ak-roh-KLIN-i-um)

(ak-roh-kl.IN-i-um)

(Correct botanical name, Heliplerum—(hee-LIP-ter-um)—roseum). An annual crewn mainly for its dried flowers, it being one of the best "everlasting". For drying, cut flowers before fully open; they retain their color for years. Flowers daisy-rike, 2-in-3-in. across, double and semi-cloud 1-2½ ft. tall. It is one of the drintiest of the annual group. Seeds generally sown outdoors where plants are to grow, or they can be started indoors where early flowers are wanted; space plants 6-in-12-in. apart.

randiflorum. ACR-5. Pk. 20c much improved type with large flow-in a variety of colors, HHA, 1 ft. -grandiflorum.

— — album flora pleno. ACR 6. Pk. 20c With double white flowers, HHA, 1 ft.

This is a very pretty everlasting flower; ac-colored ray with a yellow disk, HHA.

A GROSTIS (ah-GROS-tis)

A group of tufted annual and p

——album. ACR-3. Pkt. 15c A very neat variety with white ray. HHA, 1 it.

ACR-4. Pkt. 20c ——flore pleno. ACR-4. Pkt. 20c A fine double flowered variety with ross-colored flowers, HHA, 1 ft.

-Sensation Giants. ACR-1. Pkt. 15c;

1/2 oz. 85c This strain has flowers fully half again as large as the old type, medium rose to light pink, making beautiful cut flowers and ideal everlastings.

A DENOPHOR.

(ad-e-NOF-oh-rah)

Perennial plants of the Campanula or Bellflower Family and called Ladybells. They are very little known in the U.S. but are similar to the Campanulas; flowers bell-shaped, nodding, in erect spikes or racemes. Resent being disturbed once established.

ADEN-1. Pkt. 25c -Bulleyana. Pendulous pale blue flowers on stout leafy stems, HP, 2 ft.

ADONIS (ah-DOH-nis)

The annuals are hardy, growing well in shaded locations or under trees. Foliage, dark green, finely out terminal flowers solitary crimson or scarlet with a dark colored base, May-June. The perennial Has a downy white foliage and large umbels of soft lilac flowers, HBb, 2 ft. also desirable as a border plant; yellow-flowers in May or June. About 1-ft. tall; Sow seeds of annuals outdoors in late April or a month earlier indoors; the perennial sorts may be sown in spring pril or a month earlier indoors; the rennial sorts may be sown in spring fall.

—aestivalis. ADON-2. Pkt. 15c (Summer Adonis). Hardy annual with scarlet flowers, June-Aug.

Blue Lily of the Nile. Beautiful flowers from So. Af. blooming in late summer; easy to grow in any good garden soil; tender to heavy frost in N; should be grown in pots or tubs. They form beautiful clumps it left undisturbed.

Fresh seed should be sown which is ready in August.

Hybrids. AGAP-2. Pkt. 50c Seed saved from a rich collection from palest blue to deep blue and white and in some 12 different shades.

-longispathus. AGAP-2. Pkt. 30c A new species that is becoming very copular; flowers on 4 ft. graceful wirr stems, very floriferous; compact growth

Orientalis.

Large heads of blue flowers on 4 ft. stems, broad evergreen foliage; extensively grown in S. Calif.

——alba. AGAI
Pure white form; quite rare AGAP-4. Pkt. 30c -umbellata maximus. AGAP-1. Pkt. 40c

AGERATUM

A most popular half hardy annual especially used for borders, edging an i bedding. It also makes an easily grown indoor plant. All are free flowering, the plants covered with flowers from early summer till frost, easily grown in any good soil. Seeds are usually started indoors 4-6 weeks before time to set out—after frost danger. Strains offered are especially selected for uniform growth. In the fall, pot up a few of the smallest plants, cutting them back, and grow on indoors for winter plants. The taller varieties, about 10-12 in. tall, make good cut flowers. The dwarf sorts make ideal rockery plants. When seed is sown outdoors in May, plants flower in August. Rain does not damage the flowers.

—lasseauxi.

AGER-1. Pkt. 15c;

AGER-1. Pkt. 15c -lasseauxi.

Delightful rosy mauve; fine cut flower 20 inches.

A. MEXICANUM: Also listed as A. houstonianum. This ecies includes all the popular varieties Ageratum as follows:

AGER-2. Pkt. 15c; -Blue Ball. 1/16 oz. 40c A deep blue, ball-shaped plants very compact and extra choice, 9-in.

AGER-3. Pkt. 20c; -Blue Bedder 1/16 oz. 40c deep lavender-blue on compact 4-in.

AGER-4. Pkt. 20c; Blue Cap.

Rich Due in close heads, dome-shaped plants, fine for wockery or edging, 8-in.

Blue Star.

AGER-5. Pkt. 10c: 1/8 oz. 55c

A splendid teep blue variety from Holand, fine for edging or bedding 5-in. -Fairy Pink. AGER-6. Pkt. 20c;

Sofiest salmon rose-pink, an unusual color in ageratums, very pretty for bedding, edging or rockey and also excellent pot plants or window boxes, 6-in.

-Midget Blue. AGER-7. Pkt. 20c; Rich blue in a low extra compact uniform plant for edging or bedding, 2-3 in.

-Purple Perfection. AGER-8. Pkt. 15c; Deepest blue, plants especially good for bedding and boxes where a 9-in. plant is needed; very free flowering.

-Silver Star. AGER-9. Pkt. 15c; 1/8 oz. 70c

A pretty dwarf white flowered type es-pecially suited for edging, 6-in. -Swanley Blue. AGER-10. Pkt. 15c;

1/16 oz. 40c
Thickly bunched semi-dwarf plants in a pretty shade of azure-blue, 7-in. tall.

-White Queen. AGER-11. Pkt. 15c; Pure white flowers on 8-in. plants especially suited for a white ageratum in bedding, cut flowers, edging, etc.

-White Beauty. AGER-12. Pkt. 15c;

An extra large flowered and the best white in ageratums, plants 7-in. tall.

—Zuriblan. AGER-13. Pkt. 15c A beautiful dwarf blue novelty from Switzerland that is claimed to be extra

good
NOTE: Perennial ageratun
cee Eupatorium and Lonas.

A group of tufted annual and perennial rasses including some lawn grasses but mamental grasses as listed here. Known prnamental grasses a also as Bent Grass.

AGRO-I. Pkt. 15c nebulosa. 1/4 oz. 80c

(Cloud Grass). Hardy annual ornamental grass, fine for edging the flower borer; dwarf and neat. Plant indoors early ansplanting to beds as wanted, 12-15-in specially valued as filled in bouquets of

ALBISSIA (al-BIZ-i-ah)

Small shrubs or trees from sub-tropical regions, having graceful feathery foliage and clusters of tassel-like flowers followed by strap-shaped dry pods. They can be grown outdoors in the warmest parts of the U.S. and in the greenhouse farther N. Easily grown from seed.

stipulata. ALBI-1. Pkt. 25c ALBI-1. Pkt. 25c

ALLAMANDA (al-ah-MAN-dah)

Shrubs and climbers native of Brazil and grown in the greenhouse in the N. but it far S. they can be planted in the open; have showy purplish or yellow flowers.

Cathartica.

(Common Allamanda). Has golden yellow flawers 3 inches across, very pretty vine.

ALLIUM (AL-i-um)

A genus of bulbous flowering plants of the Lily tamily of which the flowering onion is especially listed here. Most are hardy perennials having flat or tubular leaves, similar, but smaller, to those of the onion. The flowers form at the end of the stems in spherical clusters or slender

ADON-2. Pkt. 15c spikes, in many colors and shades. They do best in rich loamy soil and easily grown from seeds which can be planted any time up to August. Space plants I ft. or more apart.

-albo pilosum. ALUM-5. Pkt. 25c Very robust grower with heads of a great many large flowers of deep lilac. I ft., HP.

ALUM-2. Pkt. 20c -atropurpureum. Flowering stems narrow but hollow, lensely flowered, heads about 1-in. across, olor blood red; from Himalayas.

ALUM-8. Pkt. 50c -bolanderi. Has umbels of clear pink flowers fringed with white, a very good species for the rock garden, sun or part shade, and does well in sandy, rocky or clay soils. HP.—cernuum.

ALUM-3. Pkt. 20c

-cernuum. ALUM-3. Pkt. 20c Lavender to white flowers, 1-ft. tall

May.

Buds nodding but flowers erected, identified by the crook in the end of the stem. ALUM-11. Pkt. 25c -geyerii.

-karataviense. ALUM-1. Pkt. 20c Lilac-blue flowers in July, 1 ft. FLUM-9. Pkt. 30c -ostrowskyanum. ALUM-12, Pkt. 25c -pallens. ALUM-6. Pkt. 25c Rosenbachianum. Large globular umbels of rose-purple flowers, HBb, 3 ft.

ALUM-10. Pkt. 25c —siculum. ALUM-7. Pkt. 35c Umbels of greenish-purple flowers in uly, HBb. 1 ft. ALUM-7. Pkt. 35c

ALUM-13. Pkt. 25c The tender mildly flavored leaves are used for seasoning and flavoring; flowers lovely white and excellent for cutting, fuly, 2 ft., HP. -tuberosum.

ALUM-14. Pkt. 25c griquetrum. Bell-shaped pure white flowers with green mid-rib on each petal; sun or shade, May-June, 1 ft., HP.

ALUM-4. Pkt. 15c Contains many species and varieties and of grat value to those wishing to grow many types and colors for display or crossing.

ALNUS (AL-nus)

The Alder: trees or shrubs with attractive foliage and handsome catkins in early spring. Seed should be sown in spring, only lightly covered, and kept moist and shaded until the seedlings appear; they germinate quite promptly.

ALNS-1. Pkt. 25c -nepalensis.

ALONSOA (al-on-SOH-ah)

(Mask-Flower). Plants mostly from tropical America and grown in the N. as tender and half-hardy annuals, also as indoor plants. Foliage dark green and bearing an abundance of 2-lipped scarlet or orange flowers, turned upside down. Sow seeds indoors in spring and set out after frost danger is passed; for growing indoors winter sow seeds outdoors in summer and transfer indoors early in the fall; when thus moved they become shrubby and bloom a long time.

ALON-2. Ptt. 25c.

ALON-2. Pkt. 250 A robust species with deep scarlet flowers, (A. myrtifolia), HHA, 2 ft.

This is a kitcher species with light scarlet flowers in Politision, HHA, 2 ft.

—miniate: ALON-5. Pkt. 25c

Fine compact habit and very free flowering; bright scarlet, HHA, 1 ft.

Warsing ALON-4. Pkt. 25c Very pretty; delicate pink with crimson centers, HHA, 1 ft.

-warscewiczii compacta.

Very shown, bright scarlet flowers, o perennial if grown under glass. A bushy type, 1-2 ft.

ALSTROEMERIA

(al-stre-MEE-ri-ah)

South American greenhouse plants belonging to the Amaryllis Family and grown from tuberous roots, treated as bulbs. Plant roots deep in rich soil and give a sunny position; they can be grown outside but must be brought indoors before cold weather arrives. Usually seed can be planted in Aug. or later, in pots, which will bloom the following summer in the garden. Sometimes called Herb-lilies.

—aurantiaca, ALST-1. Pkt. 25c
Orange, spotted with red, very hardy
and free blooming, HP, 3 ft.
—chilensis. ALST-2. Pkt. 30c

—chilensis. ALST-2. Pkt. 30c Comes in beautiful shades of pink, crim-son and orange, HP, 2½ ft.

— angustifolia. ALST-6. Pkt. 25c Flowers similar to A. chilensis but larg-er; stems 3 ft. tall, colors range thru pink, orange and flame, mainly pinks.

—pelegrina.

Lily of the Incas. Large dark pink flowers heavily spotted reddish purple on inner petals; thick glossy foliage, 14".

-- alba.
Pure white form. ALST-5. Pkt. 25c

ALTHAEA (al-THEE-ah)

Annual, biennial and perennial plants ound in temperate regions and belonging of the Mallow Family. Easily grown and common in flower gardens; do not confuse with the shrub, Althea. The common Hollyhock belongs here, A. rosea, and is isted in this catalog under Hollyhocks.

—ficifolia. ALTH-1. Pkt. 25c
The true fig-leaved Hollyhock, a fine plant with deep yellow flowers, HP, 6 ft. ficifolia hybrida. ALTH-2. Pkt. 25c A mixture of colors of this fine single class of Hollyhocks, HP, 6 ft.

This is an English grown strain of the finest single varieties and comes highly recommended to us, HP, 6 ft.

ALYSSUM (ah-LIS-um)

(Madwort). They come in hardy annuals and perennials and are exceptionally suited for edging and the rockery in sunny positions. They are all easily grown from seed, the annuals being planted early in the spring or started a month earlier indoors and grown cool. The perennials are planted at any time so that the seedlings can become well rooted before freezing weather. Foliage generally grayish, flowers white or yellow, height not over 1 ft. The perennial sorts bloom very early and they make a brilliant display with their yellow flowers. Both types can also be lifted in the fall and taken indoors for winter flowering. A. MARITIMUM:

Under this heading are listed the -muricata.

-Carpet of Snow. ALYS-1. Pkt. 15c; oz. 90c

Each plant is a flat compact mass of our snow white flowers and are ideal for ow bedding and edging; this is a superior train. 3-in. tall.

ALYS-2. Pkt. 15c; -Snow Cloth. 1/4 oz. 40c A flat compact variety of pure white lowers that give the appearance of a white carpet, 3-in, tall. Space plants about 5-in. apart.

ALYS-3. Pkt. 10c; -Little Gem. White flowers, plants 5-6-in. tall and best for tall bedding, boxes or baskets as growth is upright and more open than the compact strains.

ALYS-4. Pkt 15c; -Lilac Queen. 1/2 oz. 40c A special compact deep lilac colored AMSONIA (am-SOH-ni-ah)

Lilac Queen, W-F Strain. ALYS-5.
Pkt. 15c ALYS-6. Pkt. 20c; -Violet Queen. The most uniformly deep violet colored strain obtainable; plants compact, fragrant, 5-in. tall.

-Sweet Maritimum. ALYS-7. Pkt. 10c:

Very fragrant, for which it is especially planted, flowers pure white, growth spreading, 12-in.; make sweet plants in boxes or baskets. Mixed. ALYS-11. Pkt. 10c; 1/2 oz. 35c

Made up of all kinds, low, tall, peren-nial, etc. Ideal mixture for small children to grow. -A. Saxatile, Gold Dust.

Pkt. 15c; ¼ oz. 35c

Bright golden yellow, blooming so profusely in the early spring as to cover the
plants, 12-in. tall, compact habit.

——Silver Queen. ALYS-9. Pkt. 20c: Color primrose, an unique color in Alyssum; splendid in the rock garden, 12-in.

- -compactum. ALYS-12. Pkt. 15c; 1/4 oz. 35c Compact masses of single yellow flow ers, April-May, 1 ft., HP.

ROCK GARDEN PERENNIAL RARE SPECIES MIXED

ALYS-10. Pkt. 20c; 1/4 oz. \$1.50 A beautiful collection of many different shades of yellow on compact plants with foliage from light greenish gray to deep green. An excellent blend for the rock garden or for a hardy Alyssum planting. This is an exceptionally high grade collection and not to be confused with regular mixtures.

-lutescens. ALYS.-18. Pkt. 20c Creamy-yellow, HA.

ALYS-13. Pkt. 25c -minimum. A very small growing English variety with white flowers, HA, 2 inches. ALYS-15. Pkt. 30c

—rostratum. A prety species wi boundance, HP, 1 ft. with yellow flowers in ——citrinum.

Dwarf compact habit and having masses of pale yellow flowers, HP, ½ ft.

-spinosum. ALYS-17. Pkt. 50c This is α very distinct species with α dense spiny growth, white flowers, HP, ½ ft.

AMARYLLIS (am-ah-kill-is)

-Giant Indian Hybrids. AMRL-1, Pkt. 50c Seed from a Giant Flowering strain, the best in the world, they usually produce 1-3 stems per bulb, 4-6 giant flowers measuring 6-9 inches on each stout tall stem, 2-3 ft. high. Seed ready between April and June and should be sown fresh; order early. Flowering size bulbs can be produced the third year from sowing.

-Snow Queen. AMRL-2. Bulb, Lge. 75c ea.; Doz. \$7.50
Flowers of ordinary size and of purest snow white without any markings; unlike the Giant Hybrids it is very floriferous and hardy. Order early delivery between Oct.-March. Large size flowering bulbs offered.

AMARANTHUS

Comes in beautiful shades of pink, crimcon and orange, HP, 2½ ft.

—angustifolia.

ALST-6. Pkt. 25c
Flowers similar to A. chilensis but larger; stems 3 ft. tall, colors range thru pink, range and flame, mainly pinks.

—Ligtu.

ALST-3. Pkt. 25c
Large shall-pink flowers, needs protection in cold climates, HP, 1½ ft.

—pelegring.

ALST-4. Pkt. 25c

ALST-4. Pkt. 25c

Large shall-pink flowers, needs protection in cold climates, HP, 1½ ft.

—pelegring.

ALST-4. Pkt. 25c

AMAR 1. Pkt. 15c

—abyssinicus.

AMAR 1. Pkt. 15c

-abyssinicus. AMAR-Very pretty in groups, 5 ft.

Caudatus.

AMAR-2. Pkt. 10c (Love-Lies-Bleeding). Has long slender drooping dark red flower tassels formed in bunches and shown in group plantings, Perennial with light blue flowers, especially branches plant, HP. 4-5-ft.

— Lissadell.

ANCH-3. Pkt. 15c Perennial with Pretty

-caudatus viridis. AMAR-3. Pkt. 15c A yellow flowered variety, height 3 ft. Same as A. caudatus but with white drooping flowers, HA, 2 ft.

-cruentus. AMAR-4. Pkt. 10c (Prince's Feather). Red flowers, 3-ft. tall. Pkt. 15c

— hypochdriacus.
(Princess Feather.)
(Princess Feather.) -paniculata, Oeschberg.

Erect, dark red flowers, a new sort that should be very good. -tricolor splendens. AMAR-6. Pkt. 10c (Joseph's Coat). Rich scarlet-crimson oliage prettily variegated yellow and pronze-green; striking in the border, erect,

Molten Fire.

Deep marcon foliage, each branch being tipped a fiery crimson, poinsetta-like, 4-ft. -Mixed Kinds. AMAR-8X. Pkt. 10c;

Contains all the above sorts with others as received. They should make a good showing in a waste place, that is high, dry and of good soil, such as rubbish dumps,

AMBERBOA (am-bur-BOH-ah)

Annual plants with jaggedly cut or divided leaves and flower heads in purple, blue or pink. They resemble Bachelor Buttons. Very easily grown from seed which should be sown where plants are to flower, HHA. Natives of Spain and Morocco,

popular varieties of Sweet Alyssum, all An easy growing, long blooming, free hardy annuals, known botanically as Lobrelaria (loh-beu-LAY-ri-ah) maritima, as stars of pale purple with creamy centers; collows: seeds in position.

AMMOBIUM (a-MOH-bi-um)

These are annual Australian plants grown as everlastings. They prefer definitely a sandy soil. Very easily grown; bears a profusion of small white flowers having yellow centers which brighten the garden. Seed can be sown in spring garden. Seed can be sown in spring parly or in fall for early start. It cut become they are in full bloom the flowers will remain white; hang in a shady airy place to dry; if cut later the flowers become yellowish. They make good everaging flowers.

AMOB-1. Pkt. 20c; 1/4 oz. \$1.00 Flower heads 1-2 in. across, pearly white, the plant white cottony, 3 ft., HP.

Perennials, 1-3-ft. tall, having bluish flowers followed by rather attractive milk-weed-like pods. Can be planted in border or amongst shrubs. Easily grown from

-taberngemontana. AMON-1. Pkt. 15c A very desirable perennial tolerant to both sun and shade; has good toliage and lowers; stems willowy, each ending in arge panicles of starry blossoms in soft blue. Use some winter protection north of

ANACYCLUS

A race of daisies from the Med. regions, related to Pyrethrum; a few species are very desirable dwarf perennials with finely cut foliage and large white or yellow daisy flowers with backs of the rays striped with brilliant red. They like a sunny, stony location and are particularly suitable for the rock garden; will need

ANAC-1. Pkt. 30c Rose tined white flowers gray ferny-like foliate, easily grown in ordinary garden soil, HP, $\frac{1}{2}$ ft.

Red and white alpine daisy from Mor-

ANAGALLIS (an-ah-GAL-is)

Low growing annuals, biennials and perennials having pretty little star-like flowers in red, blue or white which grow out of the axils of the leaves on hair-like stems; very free flowering, and some species are especially fine for the rock garden. The annuals can be sown where they are to grow, and the perennials any time up to August. They do best in a loose warm soil.

Giant Flowering Mixed. ANAG-1,

Pkt. 10c

A large flowering strain in all the colors and fine for the rockery, beds or baskets, HA, 6-in. tall. grandiflora, Mixed. ANAG-2. Pkt. 10c A hardy annual having delightful little star-like flowers in vivid blue, brick red, scarlet, lavender and flesh color. Excellent for rockery, low beds, borders or in window boxes and pots; grows in any good seil, sow directly to garden, free flowering, 9-in.

ANAPHALIS (ah-HAF-al-is)

Hardy herbaceous plants of which A. margaritacea has been most popular.

-margaritacea. ANAP-1. Pkt. 20c margaritacea. ANAP-1. Pkt. 20c (Pearl. Pearly Everlasting). Hardy herbaceous perennial plant with wooly foliage. They are highly valued for dried flowers. Cut flower stalks just before flowers mature. Grows 2 ft. tall and their leafy stems and wooly appearance makes them excellent plants for the border or rock garden.

nubigena. ANAP-2. Pk. 25c Dwarf woolly plant with rounded heads of white flowers, found at 12,000 feet in Einalayans. Should be a find for the Himalayans.

ANCHUSA (an-KEU-sah)

(Alkanet, Sea Bugloss). They are excellent perennials for the summer border in sunny positions; hardy, easily grown, flowering mid-fuly-September or even later, color usually blue often in intense, striking shades. Does well in ordinary soil, sun or shade, but plenty of well rotted manure produces extra fine flowers. Having a tap root, care must be used not to break it in transplanting; after blooming, cut off flower stems, give some liquid manure to stimulate new growth for second blossoms till frost.

-capensis, Blue Bird. ANCH-1. Pkt. 15c

-Dropmore Variety.

- Opal. ANCH-4. Pkt. 15c.

Perennial with light blue flowers, especially pretty in the border, HP, 6-ft. June-July.

-Myosotiliflora. ANCH-5. Pkt. 20c (Bot. Brunnera macrophylla), Perennial producing sprays of light blue For-Get-Me-Not-like flowers, excellent for cutting; lovely in the border or rockery, April-May, 11/4 ft. Likes partial shade, good ground

Mixed Anchusas. ANCH-6X. Pkt. 10c
All of the above kinds and others as
received. Grown in your nursery planting,
a becutiful plant group of Anchusas can
be made.

ANDROSACE (an DROS-ah-see)

(Rock Jasmines). A genus of true alpine annual and perennial plants, growing in rocky places above timber-line. Many require special handling in the alpine or rock garden. Leaves are usually tuited or in rosette and often very wooly. Flowers small, in red, pink or lavender, usually borne in rather flattened rounded clusters. Requires a dry gritty soil, good drainage but not suffer from drought.

Hookeri. ANDR-2. Pkt. 25c
A pretty little stoloneferous plant growing on sandy peaty soil, flowers in clusters, brilliant pink, HP.

sempervivoides. ANDR-3. Pkt. 35c -subumbellata.

AMBR-1. Pkt. 20c

Tiny narrow leaved rosettes and sprays of small white flowers; 3-6 in. iall. A good companion plant for the choicest aipines. Biennial, but self sows moderately.

ANEMONE

. CORONARIA: (Poppy-flowered Anemone). The spring flowing species are very beautiful in both single and double flower beautiful in both single and double flowering types; the flowers are 2-2½ inches across, blooms in June. They are not exactly easy to grow as they succumb to severe heat as well as severe cold; in milder sections of the East, South and Southwest they can be grown outdoors during the winter, but in the North they require much protection. Plenty of leaf mold, with sand, a sheltered position are their main requirements. When the tubers form they can be set out in the spring; seed should be sown in a cold frame, they germinate slowly. Plants are 1-1½-tt. tall.

-Monarch. ANEM-2. Pkt. 15c
A new Swiss variety of spring flowering
Anemone.

-Single Giant French Mixed. ANEM-3. A beautiful strain received this year from France, having large single flowers in fine colors. Pkt. 20c

ANEM-5. Pkt. 15c -Hollandia. French Caen. ANEM-6. Pkt. Single giant flower type in best co ANEM-6. Pkt. 15c

-japonica. ANEM-9. Pkt. 25c Autumn flowering or Japanese Anemone, has flowers white or tinged with rose or purplish to 3-in. across, Sept. to frost; to

ROCK GARDEN SPECIES:

-albo-violacea. AllEM-27. Pkt. 35c Small species from Anatolia, relative of A. pulsatilla; shallow white flowers with blue reverses for rock garden, HP.

ANEM-1. Pkt. 20c A choice alpine plant, white tinged with rose, likes peat and partial shade, HP, 1-ft. -biflora. ANEM-31, Pkt. 25c

ANEM-11. Pkt. 25c -cylindrica. Tall native species, greenish white flow s and handsome foliage and seed heads; naturalizing at edge of woodlands, s HP.

ANEM-15, Pkt. 25c Amost variable species, ranging from 3 in. to 3 ft. in height, and accordingly suited to shady places in rock garden or border. It is impossible to predict what will come of the seed, for not only does the plant, vary in height but has flowers either borne singly or in large bunches; small flowers or large, ranging in color through white, blue, violet purple, pink, crimson and golden yellow. It likes rather cool rich soil, with light shade. Seed rather erratic in germination, HP. -demissa.

-drummondi. ANEM-32. Pkt. 50c ANEM-12. Pkt. 25c -globosa. Native of Mont. Round seed head bronze-green, 15-in. tall, May-July.

-magellanica. ANEM-21: Pkt. 25c A charming species from the Straits of Magellan having sulphur-yellow flowers HP.

-Mrs. van der Elst. ANEM-22 A very rare form of this species in a beautiful rose color, HP, 1 ft.

ANEM-3C. Pkt. 350 -magellanica. A giant form, creamy white flowers and woolly seed heads, very hardy, 1 ft.: HP

-moniana. ANEM-29. Pkt. 35c -patens nuttalliana. ANEM-13. Pkt. 25c

Good. Pasque Flower. Purple flowers in early spring before even its own wooly leaves unfold; easy as it is good, 6-10-in. tall. April-May. Pulsatilla. ANEM-10. Pkt. 20c

Violet flowers, likes chalky soils, pretty spring flowering; April-May; 1 ft., dwarf hall, plant in spring or fall.

ANEM-25. Pkt. 25c A very fine English form with deep red-purple flowers, HP, 1 ft.

ANEM-28. Pkt. 35c An early flowering form, very popular in England, HP. Good deep purple. spring flowering.

One ft. plant with white flowers and blue anthers, very free flowering and very -rivulc-is.

-sulphurea.
Pale yellow flowers; ANEM-8. Pkt. 20c s; alpine type.
ANEM-17. Pkt. 25c -tetrasepala.

A stalwart plant for the cool border, with large white flowers. It is very similar to A. narcissiflora of the Alps and Alaska, but a much larger plant, 2 ft., HP.

-virginiana. White or greenish flowers about 1½ in. cress followed by cylindrical woolly seed eads; for meadors or woods, 2 ft., HP.

vitifolia. ANEM-26. Pkt. 25c Related to A. japonica and rather similar but from the Himalayas. The heart-shaped leaves are much divided and are covered with silvery hairs. The large flowers are of palest rose, in late summer. For the samewhat shaded border or among shrubs, 18", HP.

ANODA LAVATEROIDES

ANOD-3. Pkt. 30c -hastata. A handsome plant with glaucous foliage and lovely pink flowers, HA, 10 ft.

ANOD-1. Pkt. 15c In continuous bloom from June-Nov. crinkly lustrous flowers with shallow cups in opaline tones that lie between blue and pink. Quick and easy grower, 3-ft. tall, HA. Opalcup.

-Snowcup. ANOD-2. Pkt. 15c Flowers shining new-snow-whiteness—newhiter flower. Plants are particularly even dense and formal in growth and out line an all summer bloomer, 30-in. tall, HA.

ANTENNARIA (an-te-NAY-ri-ah)

(Everlastings or Pussy-Toes). Perennia planted in the wild or rock garden an also for dried winter bouquets. Grow poor soil and easily propagated by seed. The white-wooly leaves are clustered to the basis of the propagated by the basis of the propagated by the basis of the propagated by the propagat the base of the stem and flowers are in heads.

Dense low mats of woolly leaves with relatively large white or pink heads, height 6 inches or less.

—rosea. ANTA-1, Pkt. 25c Grows to 1½-ft. tall and spreads by means of underground stems; foliage distinctly white—wooly and the bracts of the flower heads are rose colored.

ANTHEMIS (AN-the-mis)

(Goldez Marguerite, Chamomile). Very free flowering perennials with daisy-like flowers, blooms June-Sept. Does well on

dry sandy soils and in full sun. Especially good for cut flowers. Sow seed in late April or early May, outdoors, or they can be started earlier indoors. Thin plants in garden to 10-in. apart. Profuse bloomers from June-Sept.

arabica.

A first class annual; pretty golden-yellow flowers, HA, 15 inches.

ANTH-1. Pkt. 10c -kelwayi. Pure golden yellow blooming July to trost, slightly aromatic odor; attractive folioge; fine cut flower, 2½ ft., June-Oct., HP.

montana.

Charming specimen producing pure white flowers in abundance, HP, 1 ft. ANTH-5, Pkt. 25c

(Chamomile). The well known medicinal herb; white flowers, HP, 18 in. Perry's Variety. ANTH-6. Pkt. 30c
A bright lemon colored variety of this
useful border plant; fine for cut flowers,
HP, 2 ft.

ANTHERICUM (an-THER-i-kum)

Tuberous-rooted herbs of the Lily Family naving racemes of small white lily-like flowers and long narrow grassy leaves. Common names, St. Bernard's Lily, St. Bruno's' Lily. In the North they require protection and they also make fine cool greenhouse plants or for use in lawn vases in the summer. They require a plentiful supply of water when blooming.

ANTE-1. Pkt. 50c A very neat species with small white flowers, HP, 18 in.

-liliastrum majus. (St. Bruno's Lily). Pure white lily-like flowers, HP, 2 ft.

ANTHOLYZA (an-il-ot-LY-zah)

A South African genus of leafy stemmer olants of the Iris Family, growing from sorms and resemble Gladiolus, both prowth and culture. For real early flow —tinctoria.

ANTH-2. Pkt. 10c

Golden yellow ray flowers, excellent for growth and culture. For real early flownass plantings and for cutting, 2-in. across, ers they can be started inside and set out

- Super Majestic Mixed. ANTR-5.

Pkt. 3Uc; 1/16 oz. 50.

This cannot be equalled for all around use. It is a fine strain in half dwar plants with as many as 20 spikes peplant, 2-2½-ft. tall, cutting and garder display.

Prince of Orange. ANTR-7. Pkt. 25c A brilliant gold and orange, 2½ ft.

The finest tall pure white Snapdragon /2 ft.

Large spikes of very bright rose color

Terre cotta producing the most brillian effect, 2½ ft.

A very fine deep yellow in a large llowered strain, $2\frac{1}{2}$ ft.

-Rock Garden Hybrids, Magic Carpet.

Rose Queen.

Torchlight.

-Yellow King.

-Rock Hybrids.

Pkt. 30c; 1/16 oz. 50c

ANTR-9. Pkt. 25c

ANTR-10, Pkt. 25c

ANTR-13. Pkt. 50c

ANTIRRHINUM

Snapdragons are popular cut flowers both in the garden and the greenhouse-Early flowers can be had by starting them indoors in February or later on till mid-April. They are tender perennials but must be grown as annuals. The seed being small, care should be used in germinating them, they may be slow. As magus known generally as the Snapdragon is the most important species. Set plants outdoors as soon as frost danger is past. For winter bloom indoors sow seed in the open in August and transplant seedlings into pots; in more mild climates, these plants can be mulched and carried over outdoors for earlier spring flowers. Pinch out central bud when transplanting to encourage flowers on side banches.

ALL RUST RESISTANT STRAINS.

-majus gr. fl. Giant Flowered Hybrids. ANTR-1. Pkt. 25c; 1/16 oz. 40c

This is a special strain of exceptionally nice flowers and colors, on robust plants 2½-ft.

- Large Flowered Hybrids. ANTR-2. Pkt. 20c; 1/16 oz. 35c 21/2-ft. in brilliant colors.

-California Giants, Mixed. ANTR-3 Pkt. 20c; 1/16 oz. 35c 23/4-ft. tall, taller than majus group and the individual flowers larger.

-nanum, gr. fl. Mixed. ANTR-4. Pkt. 15c; 1/16 oz. 25c Large flowered, half dwarf plants, ex-ellent for bedding or cutting.

about June 1st. Bloom in summer.

—paniculata.

Montbretta-like plant with flat panicles of cange-red flowers, HP, 2½ ft. Treat as an annual,

ANTIGONON (an-TIG-oh-non)

A tendril climber grown in the N. as a greenhouse vine but in the S. it is a popular hardy climber where it has a long blooming season, grows 30 ft. in good soil. In greenhouse it requires plenty of light and not too much root room. During summer it requires plenty of water and liquid manure if confined to tubs or pots. The tuberous root must be kept dry during its resting period during winter. resting period during winter.

ANTI-1. Pkt. 15c Racemes of handsome rose-pink flowers

APHANOSTEPHUS

—skirrobasis. APHN-1. Pkt. 25c Called Pink-and-White Daisy or Lazy Daisy. The flowers are flat daisies an inch or ever across, center tiny, petals very many, narrow, over-lapping. Above the petais are pure white, but the reverse of the flower is soft pink, and the unopened buds are pure pink. The pink and the white, together with the golden flower centers, give pretty tricolor effects. Foliage is narrow and scanty, hidden from June through Sept. by the masses of flowers. 20-inches. It cuts. Easy grower. APHN-1. Pkt. 25c

ANEM-19. Pkt. 25c AQUILEGIA (ak-wi-LEE-ji-ah)

(Columbine). One of the most valuable (Columbine). One of the most valuable of hardy perennials. Its foliage is attractive, and the pretty spurred flowers cannot be equalled for colors. They bloom early in the summer. Seed can be sown anytime so as to get the seedlings set out by Sept. to get established before freezing weather. Seeds are sometimes slow to germinate. The seedlings when first set out should be given partial shade. Bone meal or well rotted manure in rich soil produces wonderful plants. We offer many tare and high class strains.

-aitkeni kurilensis. AQUI-25. Pkt. 40c AQUI-1. Pkt. 20c Excellent rock garden species, deep blue flowers in summer; 1½-ft., short spurred.

AQUI-1T. Pkt. 35c An English grown strain of this excellent tock garden type and which we list separately from the American grown strain for those wishing the English.

canadensis. AQUI-26. Pkt. 20c -chrysantha. AQUI-2. Pkt. 20c; 1/16 oz. 40c (Golden Columbine). Tall branching, yellow flowers, with long spurs, May-August.

Silver Queen. AQUI-4. Pkt. 20c arge flowered, white flowers. ematifiora hybrids. AQUI-13. -clematiflora hybrids.

Distinct in petal formation and something different; comes in bright colors, HP, 1½ ft. Columbine). 2-ft. tall, large, showy blue flowers, April, needs acid soil and deep shade.

AQUI-14. Pkt. 50c

This is an English grown strain or blen and of reselected types, coming highly recommended, HP, 6 inches.

sun or part shade, 6"-12", HP. -"Hensol Harebell". AQUI-23. Pkt. 50c

-hybrida, Monarch. AQUI-16, Pkt. 30c A popular mixture in great variety oplors and long spurs, English grown, HP/2 ft.

AQUI-17. Pkt. 50c Kashmir Form. Pale blush or pink flowers, HP, 11/2 Edelweiss.
Snow white flowers in May. AQUI-5. Pkt. 20c

A long spurred hybrid with yellow and dilowers, a miniature Crimson Star, efined, 18-24", HP.

-Mac's Long Spurred. AQUI-19.

Pkt. 25c
This is a strain grown by one of the eading seed growers in this country and comes highly recommended for brilliant colors and long spurred flowers.

-Mrs. Scott Elliott Hybrids. AQUI-7. Pkt. 25c

This is a wonderful strain with the most beautiful color combinations thru shades of lavender, orchid, mauve, blue, purple, yellow, pink, reds, etc., with beautiful pastel shades predominating, spurs and flowers very large.

-Mrs. Scott Elliott. AQUI-7T. Pkt. 50c Another English grown strain of this beautiful hybrid and which we list separ-ately for those wishing to try either strain.

—Blue Shades. AQUI-8. Pkt. 35c This is the finest strain in existence and in a most pleasing blend of blue shades, 3-ft. long, spurred.

-Mrs. Nicholls Hybrids. Pkt. 25c

A glorified caerulea with large flowers and long spurs, especially good in blue.

-W-F Hybrids. AQUI-10. Pkt. 35c This blend of hybrids can not be equalled and contains many unique colors. It is highly recommended.

Saier's Long Spurred Blend. AQUI-11. Pkt. 30c This is a carefully hand made blend

all the best long spurred varieties, and in will produce the most wonderful display of Columbines you have ever seen. NOTE: We should be able to add at leasts 25 more species and varieties to the above list as the season advances.

-vulgaris gr. fl. alba.

Munstead White. A very fine straine common Columbine in a pure w

-siellata simplex. AQUI-20. Pkt. 50c A spurless species, similar to Clemati-ora and in various colors, HP, 1½ ft. —Skinneri.

A very distinct and destrable species with crimson-red flowers having a greenish mouth, HP, 2 ft. Torkington Double AQUI-24. Pkt. 75c

Pkt. 75c

A beautiful selection of double flowers
in a great variety of colors, an English
grown variety, highly recommended, HP,
2½ ft.

ARABIS (AR-ah-bis)

A spurless species with pale brown flowers, HP, 1 ft.

—Crimson Star.

—Rabellata.

A very pretty species, dwarf habit and pure white flowers, early, HP, 1 ft.

—formosa.

RQUI-12. Pkt. 50c
Red and yellow flowers, for the rock

A spurless species with pale brown flowers, for the rock

(Rock Cress). Annuals, biennials, and and rock garden day very pretty pretty preventials including many very pretty preceded and rock garden blants all easily grown. They flower very treely in pink, white or purple flowers in April, May and into early summer. Prefer a sunny place but tolerates some shade.

Light sandy soil is best, and bone meal worked around the plants benefits them garden doing best in rich woodland soil, and A blend of above sorts with others as received.

ARIS-3. Pkt. 20c

A blend of above sorts with others as received.

ARISARUM (a-ris-AY-rum)

Arisaema Blend. A blend of above sorts with others as received.

Arisaema Blend. A blend of above sorts with others as received.

ARISARUM (a-ris-AY-rum)

Arisaema Blend. A blend of above sorts with others as received.

ARISARUM (a-ris-AY-rum)

Arisaema Blend. A blend of above sorts with others as plants all easily grown. They flower very best in pink, white or purple flowers in plants all easily grown. They flower very best in pink, white or purple flowers in plants all easily grown. They flower very best in pink, white or purple flowers in plants all easily grown. They flower very best in pink, white or purple flowers in plants all easily grown. They flower very best in pink, white or purple flowers in plants all easily grown. They flower very best in pink, white or purple flowers in plants all easily grown. They flower very best in pink, white or purple flowers in plants all easily grown. They flower very best in pink, white or purple flowers in plants all easily grown. They flower very best in pink, white or purple flowers in plants all easily grown. They flower very best in pink in plants all easily grown. They flower very best in pink in plants all easily grown.

greatly. The foliage is also attractive later lovers of unusual plants. in the summer. Sow seeds in late April or early May, out doors or the perennials can be started up to August when the plants handsome leaves, scale should be set out by Sept. Space plants 6-in. apart.

-alpina. ARAB-1. Pkt. 15c; 1/4 oz. 30c This is a dwarf compact strain, forming spreading tufts covered with sheets opure white flowers soon after snow disappears; one of the earliest plants to flower HP, 6-in.

-grandiflora. ARAB-6. Pkt. 25c A much larger white strain and a great acquisition, HP, 6 inches. ARAB-2. Pkt. 25c

-rosea. A very pretty bright rose colored strain of A. alpina and with its form of growth silver-gray foliage.

-Fruhlingszauber. ARAB-3, Pkt. 25c A carmine-rose strain from Switzerland flowering in May.

ARAB-4. Pkt. 25c Schneehaube. A white strain from Switzerland, very

Saier's Arabis Blend. ARAB-5X. Pkt 20c: ¼ oz. 30c.
This is a carefully hand made blend of the above with others included. A beautiful collection of plants can be secured from this plend with little cost.

ARACHNANTHE

(ah-rak-NAN-the)

Very showy climbing orchids, with large owers borne in drooping panicles up to ft. in length, with as many as 50 blooms f red, orange, crimson or yellow flowers, hey require same treatment as Vanda;

—cathcartii, ARMC-1. Pkt. 75c Large fleshy flowers or dark red, banded with yellow, (Coelogyne).

-Queen Victoria Improved. ANTR-8. ARCTOTIS (ahrk-TOH-tis) Plc'. 25c

Attractive daisy-like half hardy annuals that are especially valuable for cut flowers. The flowers close during the night. They can be planted in any part of the garden and grow luxuriously in good soil and a sunny position. They are quick to germinate and grow, producing flowers all summer and fall; when cut they last 7-10 days with the buds even opening when in the sun. Undeveloped buds can be cut and when placed in water indoors in a sunny window they open into perfect flowers. Start seed either indoors in late March or April or outdoors in late March or April or outdoors in late March. Trail habit, large pale yellow flowers and cordate foliage, HHP*, best grown as

-Large Flowered Hybrids. ARCT-2. Pkt. 20c

Extra large flowers in an attractive array many shades of yellow, orange, bronze, d and lavender; almost constantly in loom, colorful in beds or borders. I-ft. scapigera. ARCT-3. Pkt. 20c Red and orange shades.

A wonderful collection of Snapdragons, inches tall, in every color combination and suited for edging or for the rock garden. -Mixed Arctotis. ARCT-4. Pkt. 10c; Mixture of above kinds and others as eceived.

ARDISIA (ahr-DIZ-i-ah)

Large genus of ornamental evergreens rom tropical regions and grown only in the greenhouse in the U.S., where they nake pot plants; seeds germinate readily. ARDS-1. Pkt. 50c -macrocarpa.

ARENARIA (ar-e-NAY-ri-ah)

(Sandworts). So called because they refer a sandy soil; a large group of low rowing annuals and perennials including many high altitude alpine plants. It is a property of the same plants of growth is in dense mats, pictursque tutts or graceful trailing creepers which are excellent for carpet bedding or a the rock garden. The soil should be ight and well drained.

balearica. AREN-3. Pkt. 30c Very neat species with close tuft-like habit and small white flowers, HP, 2

nches. -juniperina.

White flowers very freely produced, P. 4 inches. AREN-4. Pkt. 30c

-lithophila. AREN-1. Pkt. 25c

Very good, native of Mont., white flowers, 6-8-in. tall, April-May. Pure white flowers, HP.

purpurascens. AREN-5. Pkt. 35c Prostrate habit, lilac flowers and a fine rock garden plant, HP, tr.

ARGEMONE (ahr-je-MOH-ne)

(Mexican or Prickly Poppy). A free flowering hardy annual with large Poppylike flowers in white, yellow and purple. Plants 2-4ft. tall and should be set 10-in. apart for a hedge which is very pretty when topped with its beautiful flowers. Good in any soil in a sunny position. They AQUI-9. Transplanting, so sow seeds where they are to grow during April. They flower all summer.

grandiflora alba. ARGE-2. Pkt. 15c
Very large flowered pure white, foliage
white marbled. They would look fine in a hedge or large group.

—platyceras rosea. ARGE-1. Pkt. 15c
An easy annual in bloom for months with big Poppy-like flowers that range from pale blush, thru rose, to smoky crimson. Try it as a hedge or as plants in the border.

-Argemone Blend. ARGE-3X. Pkt. 15c;

1/2 oz. 80c Pure white, cream, pale yellow, golden, blush, silvery rose and crimson. Mostly single, but a proportion will carry double fringed flowers. Note particularly the range of coloring in our strain, exceeding that of most others.

ARISAEMA (ar-i-SEE-mah)

Tuberous rooted perennials belonging to he Arum group. The common Jack-in-the-Pulpit belongs to this group. A moist shady place is required, and some can be grown in pots in loam and peat mixture, -griffithii. ARIS-2. Pkt. 25c

Spathe hood-like, brown violet with grageen. Very picturesque and curious, resembling the head of a cobra. -pradhanii. ARIS-4. Pkt. 30c

6" across and beautifully netted white black ground; 18" tall, tuberous roote speciosum. ARIS-1. Pkt. 25c Spathe glossy purple, greenish and

Arisaema Blend. ARIS-3. Pkt. 20c
A blend of above sorts with others as

— species.

Collected by Dr. Hu in western China; handsome leaves, scarlet fruits, shade, fairly hardy.

ARISTEA (ar-is-TEE-ah)

Iris relatives with roestles of basal caves and spikes of flowers with nearly qual segments, somewhat similar to isyrinchium. Greenhouse plants, except n the S.

ARIT-I. Pkt. 30c -ecklonii. Bright blue flowers over 2/3 in. across, in clusters along the stem; narrow leaves up to 1½ ft. long, rather tender.

ARSIAEMA

Snake Lily. ARSI-1. Pkt. 25c An Indian plant of which we have no lescription.

ARNICA (AR-ni-ka)

Perennial plants of Composite Family with clustered basal leaves and bright yellow flowers on long spikes, they are effective in colonies in the wild garden growing rapidly in any acid soil and multiplies rapidly.

—cordifolia.

ARNI-2. Pkt. 2006.

Yellow flowers, 8-12-in. tall. April, native of Montana.

ARNI-1. Pkt. 15c Mountain Tobacco. An old world plant 2-ft. tall and source of the medicinal tinc ture of arnica. Large heads of yellow ray and disc flowers, 3-4-in. clusters, thriving in sunny position.

ARTEMISIA (ahr-tee-MIZ-i-ah)

(Wormwood). Hardy aromatic plants ostly perennials or small shrubs. The flower is in heads and composed entirely of tubular disk flowers. Grown mainly for their aromatic and medicinal qualities and many fine for background planting in border or as cut flowers. Species vary greatity but do well, in average soil. Heights 6 inches to 12-ft. Flowers August thru September.

Sacrorum virtues.

(Summer Fir). Fast growing foliage plant with fine leaves and close pyramidal growth 3-5-ft., splendid for groups or specimen plants. Hardy Annual.

—vulgaris. ARTE-2. Pkt. 20c
Erect growing, with leaves green above and white cottony beneath; heads of yellowish flowers freely produced.

ARTHROPODIUM

(ahr-throh-POH-di-um)

Tufted perennials of Lily Family; grown n greenhouses in N. and in open in the 3. Easily grown; flowers in clusters, eaves grass-like.

—cirrhatum. ARTH-1. Pkt. 25c
From New Zealand, lily-like; flower stems 3 ft., well branched, carrying hundreds of small white flowers, excellent for cutting; NEW and well worth trying in shady border or pot, tender in N., Maylune.

ARUM (AY-rum)

They have large leaves and variously colored spathes. Some are hardy but many tender and require greenhouse teratment; plant in fich soil, plenty of moisture and partial shade and if left undisturbed will produce better flowers from year to year. They form tubers.

They form tubers.

—italicum.
Cuckoo-Pint. Creamy white flowers in spring; highly ornamental marbled foliage, evergreen in mild climates, 10".

—sanctum.

(Palestinum.) Beautiful blackish purple flowers, Calla-shaped, in spring, 15".

ASCLEPIAS (as-KLEE-pi-as)

(Silkweed). Perennials, many having gay flowers and attractive seed pods, easily grown in border or wild garden. Flourish best in light rich loamy soil rather sandy than otherwise, well drained soil is best. Excellent for open woods.

Curassavica.

(Brazilian Butterfly Flower). Oddly formed flowers, buff-gold with scarlet centers, the buds like burnished coral. A profuse, long bloomer in the summer garden seeds sown right where it is to stand, but also sometimes grown as an everblooming pot plant. An excellent cut flower. 1½-ft. tall.

Syriaca. ASCI.-2. Pkt. 20c
Virginian Swallow-wort. Flowers in umbels in axils of the leaves, purplish-red and pleasingly odorous, July-Aug., 3-4 ft., HP.

Butterfly Plant. One of our showies native plants; large heads of brillian orange-scarlet flowers, 2-3 ft., July-Aug. HP. ASCL-3, Pkt. 20c

ASPARAGUS

Perennial plants, shrubs and vines, most of which are grown as tender plants.

-plumosus nanus. ASPG-1. Pkt. 25c; Twining vine grown under glass in the N. but out doors in Fla. It is the favorite florist green.

sprengeri. ASPG-2. Pkt. 25c; oz. \$3.00 The most satisfactory for a house plant, easily glown from February sown seeds, taking about 30 days to germinate. Old established plants produce open recemes of small pinkish, fragrant flowers in May or June and coral-red berries about Xmas time. oz. \$3.00

ASPG-3. Pkt. 25c Tall climbing under shrub with hand-some foliage, dense sprays of flowers.

ASPERUL 4 (as-PER-eu-lah)

Used mainly in the rock garden or for carpeting shady places, growing best in moists locations; easily grown. The leaves are in whorles and the flowers small lily-shaped, in white, blue or pink.

Pretty blue flowers, effective in carpeting. 1-ft., HA.

-tinctoria. ASPR-2. Pkt. 25 Procumbent growth; flowers white, red outside, HP, 1 ft.

-scandens, Var. deflexus. ASPG-4 Pkt. 25c

An extremely graceful variety with long feathery sprays; makes ideal pot plant growing as climber or in vases; ordinary

ASPHODELUS (AS-foh-del-us)

Member of the Lily Family and closely related to Asphodeline, having fleshy roots, narrow leaves and lily-like flowers, hardy. Easily grown, preferably in rich sandy loam. These have leafless flowerstems, with the leaves clustered at the bare.

ASPH-1. Pkt. 20c (King's Spear). Grows 2-4-ft., leafy flower stems and fragrant yellow flowers in racemes, 6-18 inches long; thrives in partial shaded border.

ASFO-1. Pkt. 30c A tall robust species with large white flowers having a purple stripe, HP, 5 ft

-species from Pyrenees. ASFO-2 Pkt. 50c Has tall spikes of whitish flowers, HP

ASTERS

CHINA OR COMMON GARDEN ASTER:

Sow seeds indoors 6 weeks before time to set out in their beds which is after danger of frost has passed. Do not crowd, usually a foot apart and use care that they do not suffer a set back thru over watering, crowding or draught. It is best to transplant the seedlings care, As the roots of Asters are shallow, use care in cultivating. Make succession plantings for continuous flowering periods, but when possible use different types which flower at different times. All strains offered are will resistant unless especially noted.

-Single, Choice Mixed. AST-1, Pkt. 10c -Imp. Giants of Cal., Mixed. AST-2X.
Pkt. 15c; 1/4 ox. 90c

Pkt. 15c; ¼ ox. 90c
Flowers are large and full, crego-type,
on long heavy non-lateral stems, 3-ft. tall,
blooming late summer until frost; fine cut
flower for florists.

-Cal. Giant Sunshine. AST-3. Pkt. 15c: Fascinating new Aster type, called most beautiful in the world, 4-5-in. across composed of a single row of loosely placed outer petals which contrast with the unique yellow quill-like center; 2-3 ft. tall, early to mid-September.

Crego, Imp. Mixed. AST-4. Pkt. 10c; Wilt resistant, plants $2\frac{1}{2}$ -ft. tall, branching, tlowers double, not rounding, petals twisted, excellent cut flower, mid-Sept.

-Early Beauty, Mixed. AST-5. Pkt. 15c Wilt resistant. Flowers with Crego. Plants 21/2-3-ft. tall, with large well formed flowers, excellent cut flowers.

EARLY GIANT.

Wilt resistant. Finest large flowered, heavy stem W.R. Aster yet developed; flowers large Giants of Cal. type, 1½-tt. tall. Early blooming 4-6 weeks earlier than Giants of Cal. or mid-Aug. AST-6. Pkt. 15c; -Light Blue.

1/4 oz. \$1.00 -Rose Marie. AST-7. Pkt. 15c; 1/4 oz. \$1.00 -Mixed. AST-8X. Pkt. 15c; 1/4 oz. 85c

-Early Royal, Mixed. AST-9X. Pkt. 15c; Wilt resistant. Branching, 1½-2-ft. tall, mid-Aug., directly following Queen of the Market.

-King or Needle Type, Mixed. AST-10X. Pkt. 10c; ¼ oz. 80c
Flowers are composed of twisted quilllike petals making a very attractice flower.

-Late Branching, Mixed. AST-11X. Pkt. 15c: ¼ oz. 50c
Wilt resistant. 2½-3-ft. tall, branching,
large double flowers, early Sept.

-Heart of France. AST-12. Pkt. 15c; 1/4 oz. 90c

Wilt resistant. Brilliant red, med sized flowers, 11/2-2-ft. tall, late Aug.

SUPER GIANTS OF CALIFORNIA.

This is the largest and most fully double Aster class known; flowers 6-8-in. across, full petaled, graceful, interlacing petals. Plants 2½-ft. tall, 6-8 long, non-lateral stems per plant.

Los Angeles. AST-13. Pkt. 25c; 1/4 oz. \$1.20 Shell pink.

-El Monte.

AST-14. Pkt. 25c: 1/4 oz. \$1.20

-Pom Pom, Mixed. AST-15. Pkt. 10c; 1/4 oz. 50c Medium high and very early, medium

-Princess, Mixed. AST-16. Pkt. 15c;

Wilt Resistant. Attractive new cutting type, 2-2½-ft. tall, branching, early, 3-3½ inch flowers on strong stems and with full deep crested centers surrounded by several tows of dainty plume-like guard petals. -Queen of the Market, Mixed. AST-17.

Pkt. 10c: 1/4 oz. 60c
Wilt resistant. Very popular early flowering asters, branching, 20-in. tall, early August, one of the most useful for the early cut flower market.

- Ballet Queen. AST-18. Pkt. 15c; Wilt resistant. A fascinating shade of deep salmon-rose, 3½-in. flowers generously borne on 15-20-in. plants; extremely wilt resistant and unsurpassed for cutting or border planting.

NOTE MARKET GARDENERS: Those wish

ing larger quantities than 14 oz. may take a 25% discount from the 14 oz. price for quantities of 1-3 oz., and 33 1/3% discount on 1/4-1/2 lb. lots. For large quantities it will pay you to not only write for quotations but to book your order very early.

PERENNIAL SPECIES OF ASTERS.

perennial rock garden species, violet-daisy-like flowers on 6-in. plants, in AST-66, Pkt. 30c

fine white form of this lovely rock en species, 1 ft., HP. - Wargrave Pink. AST-33. Pkt. 35c

Delicate lilac-pink variety with large flowers; an English grown strain, HP - Large Flowered. AST-20. Pkt. 15c

New larger flowered type in mixed cold for rock garden. AST-23. Pkt. 20c -superbus.

Very pretty rock garden species AST-67. Pkt. 20c Small flowered Mont. native species drough resistant, white, 2-ft., Aug.

AST-35. Pkt. 40c -cordifolius. Has graceful sprays of small mauve flowers, HP, 1 ft.

Extremely large and long-rayed flower heads of lavender with yellow center, borne singly on foot high stems, R.G. or sunny border, 1 ft., HP.

AST-31. Pkt. 25c Hardy Alaskian. A Michaelmas Daisy native to Alaska, 12-24 inches tall and should be useful for hybridizing as well as for the Alaska type.

himalaieus. AST-40. Pkt. 25c —himalaieus. AST-40. Pkt. 25c A fine plant for the rock garden, especially suitable to the alpine meadow; also suitable for the front of the border, in sun and well drained soil. The blue-purple flowers have very narrow rays and are about 1½ in. across; 6-18", HP.—Hybrids. AST-25. Pkt. 15c

Especially large flowered. AST-34, Pkt. 30c This is an English grown strain of these nybrids, which we offer separately; this strain is from the best named varieties, HP, 6 inches.

AST-36. Pkt. 40c -hybrida nana. A wonderful new dwarf race of Asters having masses of blue, white, rose and pink flowers, HP, 6 inches.

Novi-Belgii. AST-38. Pkt. 50c Another T&M English strain, seed saved from the very best English red and blue named varieties, HP, 1 ft.

—Novae Angliae. AST-37. Pkt. 50c
A T&M strain of this beautiful native, seed saved from the best-named varieties, grown in England, HP, 4 ft.

—pyrenaeus. AST-39. Pkt. 50c A dwarf species with large blue flowers, HP, 1 ft. -sikkimensis. AST-30. Pkt. 15c

Much branched, heads tufted with many small corymbs in autumn and found in high pastures in Himalayan Mts. -subcoeuleus. AST-27. Pkt. 20c —subcoeuleus. AST-27. Pkt. 20c (diplostephioides). In every respect a quite distinct variety 12-in. tall with brilliant violet flowers of good size, end of May to end of June.

- Star of the Wartburg. PRt. 25c

NEW. Bright lavender-blue flowers with crominent yellow centers, 4" across; on stiff stems, fine for cutting, 1½ ft., HP:

—Perennial Aster Blend. AST-29X.

Pkt. 15c: ¼ oz. \$1.25

Extra choice blend containing not only the above kinds but also many others.

-Marguerite, Elegance.

(Callistephus sinesis). Single mixed flowers, tall growing; very useful for border growing and for cutting, branching habit and free flowering, HHA, 2 ft. - Southcourt Beauty Mauve. AST-61.

Mauve flowers, tall branching habit, long stiff stems, and highly recommended for cutting, HHA, 2½ ft.

-Apple Blossom. AST-62. Pkt. 25c -Lavender Queen. AST-63. Pkt. 25c -- Royal Mauve. AST-64. Pkt. 25c -- White Swan. AST-65. Pkt. 25c

The chove named varieties of large lowering single Marquerite Asters are very highly recommended for cutting and we list these varieties especially for those who wish to try them out for this purcose. They are English grown and you will find them the best of autumn cut lowers, HHA, 1½ ft.

ASTILBE (a-STIL-be)

(Spirea of the florists). Easily grown herbaceous plants with long and showy plumes of white to red flowers, in summer; easily forced in winter. Quite easily grown from seed which leads to considerable variation among the plants; sow in early spring in soil containing sand and peat or leaf mold.

White flowers in long graceful panicles 3-5 ft. tall. ATIL-1. Pkt. 30c

ASTRAGALUS

(as-TRAG-ah-lus)

Milk Vetches. Plants of the Pea Family naving deeply cut leaves and purple yelow or white flowers in spikes or racemes. Firive in light sandy soil. They are reated to Oxythorpis.

-purshii.

ASTR-1. Pkt. 25c
Nearly prostrate, dense woolly finely
livided leaves; pea-flowers of yellow with
eel purple tipped. For sunny rock gar-

ASTRANTIA (as-TRAN-shi-ah)

Perennial Eurasian plants belonging to Parsley Family; leaves deeply lobed and the flowers come in flattened clusters. Common name Masterworts.

-helleborifolia. ASTN-2. Pkt. 50c Old rose flowers; grow in shady posions.

ASTN-1. Pkt. 356 A very fine border or rock garden plant with pretty roses and white flowers, does well also along moist shady woodland walks, HP, 2 ft.

AUBRIETIA (au-BREE-shi-ah)

(False or Purple Rock-cress). Low growing perennial and an excellent spreading plant for borders, beds or rockery doing well in semi-shade and with their attractive silvery green foliage covers space in the beds; flowers grow in masses in spring and early-summer and combined with Alyssum or Arabis, make a beautiful display. Sow seeds any time up to Aug. for plants to flower the following spring.

-Borsch's Brilliant. AUBR-16. Pkt. 25c —deltoidea. AUBR-17. Pkt. 25c AUBR-18. Pkt. 20c -florplena.

AUBR-2. Pkt. 20c **-eryii.**Most beautiful blue. -Crimson King. AUBR-9. Pkt. 35c A very pretty crimson shade, HP, tr.

A very pietry crimical state, hr., to.

Giant Hybrids. AUBR-3. Pkt. 20c

A most dainty and beautiful creeping sort for carpeting beds or the rockery with its brilliant carpet of blue, crimson or rose, lasting for weeks; a gem for crevice plannling in rocks or walls, 6-in. The giant hybrids are vastly superior to the regular strains in both size and color range.

AUBR-10. Pkt. 40c -Gloriosa. A becutiful large rosy pink variety, English grown, HP, tr. AUBR-5. Pkt. 20c -graeca.

A dwarf light blue, trailing habit.

commutus crassulus. AST-22. Pkt. 15c | -hybrida Monarch Strain. AUBR-11. A new English grown strain of Aubrie-tia, well recommended, HP, tr.

-semi-double. AUBR-12. Pkt. 60c An English grown strain, seed from semi-double varieties and in many different shades, Hp, tr.

-leichtlini. AUBR-6. Pkt. 20c

Deep purple rose. -Mrs. Lloyd Edwards. AUBR-13. Pkt. 50c A beautiful violet-purple variety from England, HP, tr.

rosea splendens. AUBR-14. Pkt. 50c One of the best; large bright rose col-ored flowers, HP, tr.

-Vindictive. AUBR-15. Pkt. 50c One of the finest of the large flowering English varieties; violet-red flowers, HP, tr. -Aubrietia Blend. AUBR-7X. Pkt. 15c

A carefully made blend of many varieties and species for the flower grower wanting to grow for observation many difwanting to g ferent kinds.

AUCUBA (AU-keu-bah)

Evergreen shrubs with large ornamental Evergreen shrubs with large ornamental leaves withstanding a smoky atmosphere; tolerant of shade. Not reliably hardy N. of D.C. Grown in tubs or pots in N. where it makes a beautiful porch or terrace decoration. For a display of the attractive scarlet berries the female flowers must be fertilized by the male plants. To winter plants, keep in cool place and plants on dry side.

ACUB-1. Pkt. 25c Very similar to A. himalaica. tubers. They are nice plants in dry places in the wild garden.

-aureo maculata. ACUB-3. Pkt. 50c Very attractive shrub with golden variegated foliage, HSh, 4 ft.

AZALEA (ah-ZAY-le-ah)

Azaleas are among the most beautiful flowering shrubs and range in all heights up to 20 ft. and in many beautiful colors. They require a deep rich acid soll and as they are a kind of Rhododendron, they do best with their culture, which see. It is best to start them in frames and later in pots and when established, they can be set out in their permanent locations. While many are not hardy in the North, there are many sorts that are.

AZAL-1. Pkt. 50c Yellow flowers and bushy habit, 6 ft. AZAL-2. Pkt. 50c A spring flowering deciduous species in mixture, 4 ft.

-occidentalis. AZAL-3. Pkt. 50c Rhododendron. A beautiful and showy species, not quite hardy in the Northeast.

BALSAMORRHIZA

(bahl-sam-oh-RYZ-ah)

Balsam Roots. An American genus of Composite Family having Sunflower-like lowers. The roots are large, resinous BALS-1. Pkt. 15c -sagitiata. Leaves like shields, blossoms like sunflowers, 1½-2-ft. tall, having tap root, April.

BALSAM ... See Impatient balsamina

BAPTISIA (bap-TEZ-i-ah)

Sturdy perennial leguminous plants growing as high as 6-ft. Poliage deep green with indigo-blue, white or yellow flowers resembling Lupines in form; imposing in the border or wild garden, good for cutting, blooming late spring to midsummer, followed by short plump pods that become black. Easily grown, best in partial shade, and best to start seed in open ground.

BAPT-1. Pkt. 15c Deep blue flowers growing 3-4-ft. tall and the most popular, June and July, leaves 21/2-in. long. Tallest species.

See Cardiospermum hal.

BARTONIA. See Mentzelia lindleyi. BAUHINIA (bau-HIN-i-ah)

Mountain-ebony. Tropican trees, shrubs and vines of Pea Family. In the South they make a fine showing with their color-tentails." For the rock garden, in light shade, HP, 6 inches.

BETA (BEE-tah)

nme, Beets. A very few sorts tal, which are listed here; soil. Common name, Beets. re ornamental, which equires rich soil.

-dracaenaefolia. BETA-1. Pkt. 25c

BHUJA

ul racemes of white, purple and yellow owers.

-alba. BAUH .- 2. Pkt. 200 -acuminata. BAUH .- 3. Pkt. 25c -hookeri. BAUH-1. Pkt. 50c Large tree with crimson-edged white lowers 1½ in. long in terminal racemes; ender in N.

BEANS (Ornamental)

BEAN-1. Pkt. 15c -Scarlet Runner. 1/4 lb. 45c

BEAUMONTIA

(boh-MON-shi-ah)

Vigorous woody tropical vines, probably best grown as a greenhouse vine in the U.S. (We would be pleased to hear from anyone having grown it here).

-grandiflora. BEAU-1. Pkt. 40c Herald's Trumpet. Grown in warm reenhouses and outdoors in the South mside, plant it in a bed, training the vine of the roof; large fragrant white flowers rumpet-shaped, in terminal clusters; prune wood here well. rumpet-shaped, in terminal clusters; prune wood back well for next year's flowers

-koreana. BERB-2. Pkt. 60c A deciduous species with very highly colored foliage in the autumn, 3 ft. -lycium. BERB-4. Pkt. 25c

-thunbergii. BERB-3. Pkt. 25c Hardy shrub that can be easily grown from seed and very commonly used for andscaping or for hedges, 4 ft. andscaping or 101 Head attraction of the state of the sta

(Red Leaf Barberry). The seedlings Strap-shaped green leaves, striped on purple-red leaves; sow seeds very early.

BEGONIA

This is a very large and varied group of succulent, and partly shrubby, plants found in warm regions of the earth. There has been countless numbers of hybrids and varieties developed so that the dividing line between types has even become dimmed. We list here, especially, those increased by seed. There is plenty of interest in growing the various species and crossing them for new types and varieties. All begonias can be increased by seed, which, being very small, should be sown with the greatest care. They thrive in a mixture of fibrous loam, with leaf mold with some rotted cow manure and sand added. They can be divided into a groups, viz., fibrous rooted, tuberous rooted and rhizomatous.

—andersonti.

BEG-1. Pkt. 25c

BEG-1. Pkt. 25c -andersonii. Leaves large, entire, flowers borne in an umbel at the apex of a tall spike.

-bhotan. Leaves entire, ver flowers pink, scented. very large, tuberous,

—josephi.

Tuberous, flowers rose colored and small. BEG-9. Pkt. 25c BEG-3. Pkt. 25c -lacinata. Leaves palmate, epiphytic, flower small, rosy white, found in temperate regions. BEG-4. Pkt. 25c - -var. lutea.

A yellow flowering variety. BEG-12. Pkt. 25c -picta. Root stock tuberous, flowers pale rose leaves variegated.

SEMPERFLORENS: This is a dwarf compact grower and almost an everbloomer, very popular as a summer bedding plant and for winter flowering under glass. It comes in many beautiful varieties. All HHP best grown as annuals.

-Crimson Bedder. BEG-19. Pkt. 50c Small bright crimson flowers and splendid bedding variety.

-Loveliness. BEG-20. Pkt. 50c Clear rose-pink flowers in great profusion. -Lucifer.

DEG-21. Pkt. 50c
Very large flowers, often 2 inches across
and in α bright salmon.

-Semperflorens, Luminoses BEG-14 Pkt. 250 Fiery dark scarlet flowers, dark reddish brown foliage.

—compacta. BEG-25. Pkt. 50c
Compact plants in the best colors for
greenhouse growing, a new German strain - Prima Donna. BEG. 15. Pkt. 25c

Limpid rose shading to carmine at center, everblooming. Pink Bedder.

Erect habit of growth, bright pink flowers and very floriferous.

Re! Jewel.

A beautiful red flowered variety from Germany for greenhouse growing. BEG-24. Pkt. 50c Rose Pearl.
Bight rose flowers much like Gloire de Lourain; very good for pot culture.
BEG-16X. Pkt. 25c

A blend of best named varieties in the B. semp. group. This is a high class blend.

-Saier's Begonia Blend.

This is a hand made mixture of all kinds of Begonias, made especially for those wanting to grow all different types. If purchased separately would cost many dol

BELLIS (BEL-is)

(English Daisy). Herbaceous annuals o (English Daisy). Herbaceous annuals or perennials. They need a fertile moist soil with plenty of sun. They can be grown from seed planted in the fall and wintered over in the cold frame or flowers will be produced from early sown seeds in the spring. They grow 6-8-in. tall and make good pot plants, for colonizing in the lawn like Crocus or for edging or low border. Do best in cool climate, blooming May-Aug. Planted with Pamsies or For-Get-Me-Nots they make a pretty garden display.

BELL-1. Pkt. 25c -enorma, Mixed. liliput, Rose.

Wery small plants and flowers BELL-2. Pkt. 25c

-monstrosa, Mixed. ELL-3X. Pkt. 25c Single flowers, strong growers. -Red Beauty. BELL-9. Pkt. 35c

-Rose Beauty. BELL-10. Pkt. 35c -White Beauty. BELL-11. Pkt. 35c - Double, Mixed. BELL-4X. Pkt. 35c -perennis, Longfellow. BELL-5.

Pkt. 25c; ¼ ox. \$1.25

An extra double, bright red strain - rosea delicata. BELL-6. Pkt. 25c; 1/4 oz. \$1.25

BELL-7. Pkt. 25c;

1/4 OE. \$1.25

BESSEYA (BES-se-ya)

- Snowball.

Closely related to Synthyris and more interesting for their leaves than for the usually pale or even petalless flowers. Quite easily grown in a gritty soil rich in humus, preferably in light shade, suitable for the rock garden, but of botanical rather than horticultural interest.

-rubra. BESS-1. Pkt. 250 Brownish heart-shaped leaves and short spikes of petalless flowers; the long an thers are bright red-purple and in such numbers that they make the plant quite attractive; known to westerners as "Kit

patra.

An Indian tree; the bank layers used ancient times as paper.

BILLBERGIA (bil-BUR-ji-ah)

These are air plants growing on trees or rocks like orchids; they grow in most any situation and in pots containing peat moss, leaf mold or soil or combinations of them; 80% leaf mold and 20% rotter manure is also good. Partial shade and water in the cup formed by the leave are the two requirements. They are well worth growing for their interesting foliage and graceful and beautiful flowers; tender grow indoors in the N. during winter.

Largest of the varieties both in foliage and flower; flowers bright pink and yellow green.

BIXA (BIK-sah)

Tropical trees with large leaves and showy flowers in terminal panicles, pink in the species offered; hardy in the S. or may be grown in the greenhouse.

-orellana. BIXA-1. Pkt. 30e Annatto Tree. Grown in Florida for its dye, which is used in butter and cheese. It is easily grown from seed.

BOENNINGHAUSENIA

Similar to Thalictrum and requiring the ame treatment but more refined and ele-

A very dainty plant with small glau-cous gray leaflets and a profusion of snow-white Thalictrum-like flowers in late summer; for R.G. or front of border, 1 ft., HP.

(False Chamomile). Tall perennials grown in the border or in groups in the wild garden.

BOMBAX (BOM-pake)

-malabaricum. BOMX-1. Pkt. 36c The red or scarlet, rarely white, flowers re over 6 in. long, in clusters near the

BOUGAINVILLEA

(boo-gin-VIL-ee-ah)

Strong growing shrubs grown in green-houses in N. but in Fla. and Cal. they make showy outdoor climbers; easy to grow; sunshine.

BOUG.-1.

BRACHYCOME (brak-i-KOH-me)

(Swan River Daisy). Herbaceous annu-uls and perennials with generally branch-ng stems and solitary or loosely clustered leads of daisy-like flowers.

-iberidifolia, Mixed BRAK-1. Pkt. 10c 1/4 oz. 50c

BRIZA (BRY-zah)

(Quaking Grass). Ornamental grasses grown mainly for bouquets, drying or for specimen plantings. They are easily grown from seed. There are several small annuals and perennials, and called Quaking Grass on account of the spikelets trembling in the lightest breeze. They are especially valued dried for use in bouquets. Sow seed early in spring in average good garden soil.

gracilis. BRIZ-1. Pkt. 15c; 1/4 oz. 25c -maxima. BRIZ-3. Pkt. 15c; 1/4 oz. 25c

-Minina. BRIZ-2. Pkt. 15c; ¼ oz. 25c Annual, slender and graceful, 6-in. tall.

BRODIAEA (broh-di-EE-ah) Hardy on west coast and in S. They can also be grown in the N. in rock gardens by careful protection. They are excellent for naturalizing, the flower is delicate, loose umbels of pretty funnel-like flowers in spring and summer. 6 inches to 3-ft tall, thrive in any soil not too heavy or wet and dislike rich manure or fertilizer but do best in sunshine.

-californica. BORD-2. Pkt. 50c Large blue flowers, full sun, 6"-8", HP.

coronaria.

BORD-4. Pkt. 50c
The most beautiful of the Brodiaca; this
special strain has 5-15 upright gentianblue lily-like flowers to a stem; a rarity;
heavy clay loam, full sun or very light
shade, 6"-12" tall, HP.

eeds and bulbs are hard to find. -hendersoni.

Very choice species, flowers in heads striped brown, sun or half shade, light to heavy loams with humus; rock garden, 4"-6" tall, HP.

BUDD-5. Pkt. 30c An Indian species

globosa.

(Orange Ball). Handsome half-evergreen shrub from Chile standing a few degrees of frost striking in bloom with the long stalked round heads of orange yellow flowers, 15 ft.

BUDD-2, Pkt. 50c A large tender shrub native of the Himalayas and said to be the most beautiful of all the Buddleias, having dense spikes of purple or crimson flowers with white eye, TP, to 20 tt.

Gray flannel leaves and great flac-like clusters of lavender stars with golden eye; loves hot dry locations, very fragrant, not quite hardy in the N. BUDD-3. Pkt. 30c -intermedia.

(beuf-THAL-mum)

(Ox-Eye). Showy composite plants, perennials, 3-4-ft. tall, with large rather coarse leaves and yellow flowers. Easy culture, requiring a dry sunny position,

BOCCONIA (bok-OH-ni-ah)....... See Macleaya.

BOLTONIA

Very good, bluish white to pink airy daisies blooming at leasts 2 months, 5-H., HP.

Silk Cotton Tree. Large digitately div-ded leaves and very showy flowers in clusters; tender, for the southern gardens or greenhouse.

dre over 6 in. long, in clusters ne tips of the branches; very showy tree.

-Hybrids, Finest Mixed. Pkt. 30c

Covered throughout the summer with star-shaped blooms in white and blue; 12-in. tall, graceful plants, fine for beds, border or rock garden, HA.

—capitata.

Earliest of all the species, April-May, ight blue compact heads; sun or light shade, heavy to light soils, 6"-12", HP.

douglasii.

Stiff stems about 2 ft. high with royal blue flowers; an excellent cut flower. Prefers a mildly acid soil in sun or part shade; sub-zero hardy. It produces iew

-pulchella. —pulchella. BORD-6. Pkt. 50c Flowers in erect heads, clear blue, sun, heavy to light loams, 12"-15", HP.

BUDDLEIA (BUD-lee-ah)

Butterfly Bush. Deciduous or half ever-green shrubs or trees belonging to the Logania Family, and only a few are hardy in the North; they grow rapidly and are free bloomers. They are easily grown from seed and there should be much in-terest in growing hybrids from them. Start them in frames for the first year.

-colvilei.

-farrari. BUDD-4. Pkt. 25c

BILL-1. Pkt. 40c BUPHTHALMUM

they are useful for bold effects toward the strain with orange-red flowers with dark back of the perennial border. Sow seed centers; its long orange petals make it very double, robust growth, long stems; the first year.

BUPH-2. Pkt. 35c A neat border plant with yellow flow a root runner and spreads rapidly, 2 ft.

BUPH-3. Pkt. 45c A showy Hungarian species with foliage and yellow flowers, HP, 5 ft.

CACALIA-see Emilia.

CACTUS

Succulent perennials, varying much in their form from tree-like growths to very small plants. Many are not considered hardy in the N. and when grown in the rock garden, plants grown in pots which are plunged into the soil, are used. They are the easiest plants for growing in the house and stand any amount of neglect. Those native to the N. must be perfectly dry during the winter. While some are desert plants, many of the best come from the tropical regions, all of which are tender here. Good drainage is important in all types, water at the roots will ruin them in a single day. Planting on a sloping sed is almost necessary and the soil should be on the sandy order, not a heavy soil. For planting sow a few seeds in a pot with plenty of drainage, Most sorts germinating in 20 days but others may require as much as 4 months. Grow your plants on in pots, both for indoor and outdoor use. Do not allow to freeze and in the fall bring them inside and store in a cool basement where there is a little sunlight. No care is needed during this resting period which should be at least 2-3 months. Another caution, do not water overhead and always in limited amounts and not often. months. Another caution, do not water overhead and always in limited amounts and not often.

A mixture S. Am. cereus cactus seed plants being very much like cereus peru-vianus. One of the fastest growing types vianus. One of the fastest growing types, flowers white, very large and appear only nights, fruit bright red and is like a delicious apple; grows tall with arms very much like the Arixona Giant Cactus.

-echinocereus enneacanthus. CACT-2. Pkt. 15c

(Twisted Rib Cactus, Strawberry Cactus). The delicious fruit taste very much like strawberries, native of S. Texas and N. Mexico, grows in clumps having as many as 100 heads at times; 4-in. in height in 2 years, flewers are rich reddish purple about 2-in. across opening noon to 3 o'clock, April-June.

-ferocactus mizlizenii. CACT-3. Pkt. 150 (Barrel Cactus). Very beautiful scenic desert plant, stems globular to cylindrical often very large to 6-ft. or more; flowers in clusters at top of plant, yellow in color, plant dark green, growth 3-in. diameter in 3 years.

CALAMINTHA (cal-a-MIN-tha)

Aromatic plants, including herbs and small shrubs, with whorles of tubular flowers, 2-lipped, from white to purple; not only useful in the herb garden, many are also attractive in the sunny rock garden where dwarf easily grown shrubs are hard to find; also used in front of border, all are quite hardy and easily grown in sunny places, in ordinary soil. Botasically very close to Satureia, which includes Summer Savory. includes Summer Savory.

A fine border plant with bright rose-purple flowers, doing well in ordinary soil, HP. 9 inches.

CALANDRINA

(kal-an-DRIN-i-ah)

Low growing spreading fleshy plants of the Portulaca Family, occasionally grown as arnuals in the rock garden or edging in borders. Require a sunny location. Flowers orange-yellow and coppery rose to brick red or crimson magenta.

COLD-1. Pkt. 20c Crimson-magenta, hardy annual.

CALANTHE (kah-LAN-thee)

Mostly tropical terrestrial orchids which are very popular; they are easily grown by following a few cultural requirements. They have beautiful long racemes of white, rose or pink flowers. They are well worth growing. See Orchids.

CLAN-1. Pkt. \$1.00 -brevisonum.

CALCEOLARIA

(kal-se-oh-lay-ri-ah)

A very large genus found in Central and South America, comprising prostrate creepers, rosetted plants and shrubs. All have pouch or slipper-shaped flowers, usually of yellow, often with dots and splotches of other colors.

-hybrida rugosa. CALC-2. Pkt. 75c Shrubby varieties in beautiful mixture, GP*, 1½ ft.

1/2 oz. 30c An annual species, with small yellow slippers in profusion in summer; likes a cool moist shady place and should be very happy in the fern bed, HA, 1 ft.

CALIFORNIA POPPY. See Eschscholtzia.

CALENDULA (kah-LEN-due-lah)

They are definitely cool weather loving They are definitely cool weather toving plants and in the warmer climates should be sown in the fall for early bloom in the late winter and early spring. While they like full sun they cannot stand the burning sun of summer. In colder climates, seed should be started in the cold frame and plants set out as soon as possible for late spring and early summer bloom. In planting Calendulas be sure you choose the proper type for your needs. The outdoor growing sorts are sturdier, more compack growth and much beher for garden we, while the forcing varieties for greenhouse use are best for indoor growing.

CALN-1. Pkt. 10c; -chrysantha. (Sunshine). Large clear buttercup yellow. CALN-2. Pkt. 10c; 1/2 oz. 30c

(Sensation). Large brilliant orange with scarlet sheen, somewhat open centers; very good.

-Corniche d'Or. CALN-3. Pkt. 10c: 1/2 oz. 30c Golden yellow.

-Frilled Beauty. CALN-4. Pkt. 10c; 1/2 oz. 30c Double orange flowers with frilled petals. -Lemon Queen. CALN-5. Pkt. 10c; ½ oz. 30c

Pretty sulphur-yellow flat headed vari-CALN-6. Pkt. 10c:

-Orange King. FLORIST STRAIN. Reselected Florist — palustris alba.

-Radio. CALN-7. Pkt. 10c; 1/2 oz. 30c 1/2 oz. 30c; oz. 50c Double, quilled petals, orange scarlet

Orange Sunshine. CALN-8. Pkt. 10c; 1/2 oz. 30c Like Chrysantha except it is a clear light orange.

-Sunshine Golden yellow, gracefully curled outer petals and incurved center petals, long stemmed chrysanthemum-like flowers, cuts

-Yellow Colossal. CALN-10. Pkt. 10c: Large Chrysantha type but more double.

-Mixed Florist Calendulas. CALN-11X. Pkt. 10c; oz. 50c Special varieties and strains for green-

Mixed Art Shades. CALITY-IN-MIXED Pkt. 10c; oz. 50c

Pastel shades in many varieties CALN-13X. -Mixed Calendulas. Pkt. 10c; ox. 40c

CALLIOPSIS (kal-i-OP-sis)

Listed here are the annual species of the genus Coreopsis. They are hardy annuals, easily grown and make bright and cheerful garden flowers. Sow seed early in April where they are to grow and thin plants to 5-in. apart if you want a strong growth. The usual height is 2-3 feet and they should be planted in the border in groups; excellent cut flowers. Most of the varieties following come under C. tintoria. a few under C. drummondii.

CALP-I. Pkt. 10c; 1/2 oz. 40c

Double and semi-double flowers in brilliant combinations of yellow and mahogany and are much more showy in gardens and bouquets than the single varieties; definitely a better strain, 3-ft.

-bicolor marmorata. CALP-2. Pkt. 10c; 1/2 oz. 35c Bright golden marbled with wallflower

-Crimson King. CALP-4. Pkt. 10c; 1/2 OZ. 40c Dwarf: red flowers.

drummondi, Gold Crest. Another NEW novelty in a rich golden rellow with a reddish brown zone; flowers 21/2-3-in. across and semi-double, 18-in.

tall. - Golden Crown. CALF-8. Pkt. 10c; Brilliant golden yellow with glossy narroon center zone, 18-in. tall.

-Golden Ray. CALP-3. Pkt. 10c; 1/2 oz. 30c Dark purplish brown center with broad

golden-yellow margin. Dwarf. -nigra speciosa . CALP-9. Pkt. 10c Quaint reddish maroon flowers. -Dwarf Mixed. CALP-5X. Pkt. 10c;

Plants 18-in. tall and in all colors and compinations.

CALP-6X. Pkt. 15c -Dwarf Goblin. A novel mixture of 6-inch plants in yel-lows, reds, browns and pleasing bicolors, in these extra dwarf plants. Here should be an extra good strain for covering large bare spaces, quickly, requiring low color-ful plants.

TINCTORIA: (elegans or marmorata). Showy border plants and fine for cutting; rays yellow, crimson-brown at base and disk brownish-purple, HHA, 1-2½ ft.

Beauty. CALP-10. Pkt. 25c Elegant variety of dwarf compact habit golden flowers, crimson center, 9 inches CALP-10. Pkt. 25c Dazzler. CALP-11. Pkt. 25c In rich, dazzling colors

-Lemon Queen. CALP-12. Pkt. 25c Tall lemon-yellow, red zoned, excellent for cutting and border, 2½ ft.

Star of Fire. CALP-13. FAN.
A mass of Cactus-shaped fiery red A mass of C flowers, 9 inches.

-The Garnet. CALP-14. Pkt. 25c Covered by a multitude of crimson scarlet flowers, $1\frac{1}{2}$ ft.

Rich bronze, striped and mottled yel-ow, 1 ft. Pretty.

"Mixed Tinctoria Varieties. CALP-16X. Pkt. 20c

CALOCHORTUS

(kal-oh-KOHR-tus)

W. Am. plants of Lily Family forming forms and bearing bell-shaped, lilac, yel-ow or white flowers. They are known inder such common names as: Mariposa Falips, Butterfly Tulips, Globe Tulips, Starfulips, Sego Lily and Fairy Lantern. They are of great beauty, showing many exquisite tints and markings and varying greatly in form. Hardy in the N. but should be protected against winter heaving. Open sunny positions in light soil include be protected against winter heaving. Open sunny positions in light soil and should be well drained, a raised bed being ideal. The corms should be handled much as tulip bulbs; they are also grown in pots but do not force too much.

macrocarpus. CALO-2. Pkt. 25c
Large lavender flowers, 10-18 inches tall, June-July, a native of northern Mon-

-maweanus, Pale lavender cups with black spot at band of petals, flowering in early spring; the easiest and most permanent of the genus in the East; prospers in heavy woodland soils in sun or half shade; rock garden plant, 4" high, HP.

CALTHA (KAL-thah)

Small aucculent perennials chiefly of N. Am., of Crowfoot Family. Thrive in marsh land near running water but can be grown in moist sections of the flower border. They are especially nice near water gardens, blooming in the spring and often again in the foll. Flowers are without petals, but the sepals of yellow, pink or white are very showy. They make long lasting cut flowers.

acaposa. CALT-2. Pkt. 50c
Dwarf, with broad-rayed flowers borne
ingly on short stems; this come from the
lymalayan mountains and is particularly CALT-2. Pkt. 50c

CALT-3. Pkt. 50c Large white buttercups and a center of golden stamens over glossy arrow-head shaped leaves; very fine for a moist place in full sun, on edge of brook or pool, for rock gardens or bogs, 6", HP. A very rare pure white form of the common Marsh Marigold, for wet loca-tions in sun or light shade, 2 ft., HP. leptosepala. CALT-4. Pkt. 50c

Similar to C. biflora, but 4" high, HP. Glossy arrowshaped leaves and rather large white flowers with a heart of golden anthers; becutiful for wet places in sun or light shade; 1 ft. CALT-1. Pkt. 25c

CALT-6. Pkt. 35c -scaposa. For marshy places; flowers yellow plant 4' tall.

CAMASSIA (kah-MAS-i-ah)

No. Amer. bulbous plants of Lily Family naving blue or white flowers in graceful racemes and narrow grass-like foliage. Perfectly hardy, plant in groups of 10 or more, 3-4-in. apart, in border. The small Perfectly hardy, plant in groups of or more, 3-4-in. apart, in border. The sn species are good rock garden subjects.

—quamash. CAMA-1. Pkt. 15c The common Camass, blue flowers, 18-in. tall, very good, May June.

CAMA-3. Pkt. 35c -leichtlini. Pretty purple to white flowers, indifferent to type of soil, doing well in sun and for naturalizing in meadows, 18"-24", HP.

esculenta. CAMA-2. Pkt. 30c Erect spikes of pale blue; excellent for cutting, HBb, 2 ft.

CAMPANULA

(kam-PAN-eu-lah)

(Kam-PAN-eu-lah)

(Canterbury Bells, Bell Flower, Harebell and Bluebell). Biennial and perennials with a few annuals. There are a great marry species, of which we carry an exceptionally large number. The annuals are started from early planted seed and the biennials usually indoors early in March when they usually flower the first year. Handle the perennials in the regular way, getting them well rooted in their permanent position before frosts. They should be mulched with leaves where the winters are severe.

A strain that will flower first year is sown early; blooms in 5-6 months, shown in the border and a good cut flower, 2-21/2 ft. fall

C. MEDIUM: (Common Canterbury Bells) This species is the well known Canterbury Bell, in all its forms. They are biennials. Flowers June-July, 3-ft.

- Single, Mixed, CAMP-11X, Pkt. 10c: 1/4 oz. 30c CAMP-34. Pkt. 25c -Lavender. Single lavender flowers of good form. - -fl. pl. Blue. CAMP-8. Pkt. 10c;

1/4 oz. 35c Double blue flowers. CAMP-9. Pkt. 10c; - -fl. pl. Rose. 1/4 oz. 35c

Double rose flowers. - fl. pl. Double, Mixed. CAMP-10X. Pkt. 10c; 1/2 oz. 40c. - Calycanthema, Mixed. CAMP-12x.

Cup-and-Saucer type. CAMP-36. kt. 25c
— Lavender. CAMP-36. kt. 25c
— CAMP-51. Pkt. 25c
— Violet-blue. CAMP-35. Pkt. 25c
— White. CAMP-50. Pkt. 25c
— CAMP-12T

Pkt. 25c

——fl. pl. Mixed. CAMP-10T. Pkt. 20c An English grown strain of double Can-erbury Bells. -alliaraefolia. CAMP-17. Pkt. 25c

A very desirable border plant with creamy-white flowers, HP. 2½ ft. CAMP-18. Pkt. \$1.00 A rare species from the Caucasus. -barbata.

CAMP-19, Pkt. 40c distinct and pretty species with pale celain blue flowers, HP, 1 ft. -bononiensis. CAMP-20. Pkt. 25c A tall branching type with pretty blue lowers in loose spikes, HP, 3 ft.

-carpatica, Blue. CAMP-3. Pkt. 15c (Carpathian Harebell). HP, blooming all ummer; for edge of border or rock garden, partial shadde, 10", July-Aug.

CAMP-4. Pkt. 15c Same as above, except color is -Dwarf Hybrids. CAMP-21. Pkt. 40c New dwarf varieties and excellent for rock gardens; this is an English grown strain, HP, 6 inches.

A distinct and good variety with large 2-3 ft. stems, June-July.

CAMP-27. Pkt. 30c A beautiful white form of this species, flat blue flowers, HP, 9 inches.

-Riverslea. CAMP-23. Pkt. 50c A very handsome form with large flat-tish clear blue flowers; fine, HP, 1 ft.

CAMP-24. Pkt. 35c -White Star. A charming compact English white flowered form, HP, 1 ft.

-celtidifolia. CAMP-25. Pkt. 35c A fine border species, tallish habit and with pale blue flowers, HP. 21/2 ft. -lactiflora. CAMP-26. Pkt. 35c

Handsome strong growing species, white o pale blue, HP. 2 ft. CAMP-6. Pkt. 150 -fragilis. A rare type, celestial blue, fine for the rock garden or in pots, HP.

CAMP-7. Pkt. 15c -garganica. Elegant dwarf trailer, flowers blue, HP. ——hirsuta. CAMP-28. Pkt. 50c Pale blue flowers, hairy foliage, dwarf trailer, HP.

hybrida Abundance. CAMP-30 Very free flowering hybrid with lilac-blue flowers, HP, 6 inches.

-Norman Grove. CAMP-31. Pkt. 60c A real alpine gem, free flowering and rich blue flowers, HP, 4 inches.

- imperialis, Mixed. CAMP-37 Pkt. 25c A pyramidal growth with upright flowers with colors rich and varied; this should be tried, HB, 2½ ft.

-lactiflora. CAMP.-26. Pkt. 35c CAMP-32. Pkt. 30c -latifolia. Very large blue flowers in abundance, indigenous to England, HP, 2 ft.

CHRYSANTHEMUM

(kris-AN-the-mum)

This is a rather large genus of annual and perennial plants, with flowers in all colors excepting blue and true purple. China, Japan and India have furnished us with most of them but hybridizing has been carried on to such an extent that we have innumerable hybrids. Classed under chryscathernums where they belong the nave innumerable hybrids. Classed under chrysanthemums where they belong are (1) the garden annuals, (2) the perennial border sorts, (3) feverfew. (4) pyrethrum, (5) marguerites and (6) the florist's chrys-anthemum.

Bloom in late summer, easily grown, robust and seed sown in open ground as early as soil can be worked. They are fine for mass flower effect and should be thinned to 1-24t. apart. Best in sunny location.

CARINATUM: The popular Painted Daisy, plants 2½-ft. well branched, flowers 3-in., all with dark eye, surrounded by narrow yellow ring, then slightly wider scarlet or crimson ring, followed by the dominant color of the variety. They make the best cut flowers.

-hybridum double fringed. CHRY-35. Beautiful English mixture of improved appries in double flowers, HA, 2½ ft.

-Chameleon. CHRY-2. Pkt. 10c; Golden chamois, scarlet and yellow zone,

-Eclipse. CHRY-3. Pkt. 10c: 1/2 oz. 25c Shading from light yellow to tawny apri-cot with garnet band and yellow zone, 2½-ft.

nivelli. CHRY-16. Pkt. 10c -nivelli. CHRY-4X. Pkt. 10c; -Merry Mixture. CHRY-4X. Pkt. 10c. A new blend of extremely gay tricolors

White Queen. Pure white flowers with a pale lemon zone, HA, 2½ ft. CHRY-36, Pkt. 20c

-Single, Mixed. CHRY-19, Pkt. 10c; 1/2 oz. 25c A fine mixture of the many levely colors of this hardy annual, 30-in. tall.

CORONARIUM:

Golden Glory. CHRY-37. Pkt. 20c
A charming new English single variety,
deep canary-yellow, central disk in same
color, pretty, HA, 3 ft. CHRY-37. Pkt. 20c

-Golden Gem. CHRY-38, Pkt. 30c A very pretty dwarf double variety, every free flowering and a fine one for culture, beds or for cutting, HA, 1 ft.

Double Golden Crown. CHRY-5. Pkt. 10c; 1/4 oz. 45c Has attractive silver green foliage and bright butter-yellow flowers, 2½-ft.

-Double, Mixed. CHRY-6. Pkt. 10c; 40-in. tall. Extra choice mixture. -inordorum, Biday Robe. CHRY-14.

Pkt. 15c CHRY-15. Plet. 15c A highly recommended new rely of a dwarf compact growth bearing profusely all thru summer its lovely, large, fully double, white flowers as its name implies. Excellent for border or cutting, HA, 10-in. tall.

SEGETUM:

Here the plant habit is similar to Carin-atum, 2½-ft., flowers 3-in., with dark or ight eye surrounded by inconspicuous oale yellow disk, then dominant color of variety.

Eastern Star. CHRY-17. Pkt. 10c Bright yellow flower, with dark centers. 3-in. across, 1-ft., HA. CHRY-17. Pkt. 10c

CHRY-40. Pkt. 20c Color deep canary-yellow with black center, pretty, HA, 11/2 ft.

Morning Star. CHRY-41. Pkt. 20c Large yellow flowers with black centers,

From Anatolia, a fine form —persicifolia. CAMP-38. Pkt. 25c
(Peach-leaved Belliflower). The most becautiful of the perennial sorts, violet-blue flowers in June-July in profusion; separate plants in early fall or spring for a vigorous growth, HP, 2 ft. CAMP-38. Pkt. 25c

CAMP-27. Pkt. 30c

-gr. fl. Telham Beauty. This has very large bells of a beautiful hina-blue, HP, 2 ft.

Poscharskyana. CAMP-41. Pkt. 30c Spreading habit with sprays of lovely alle blue flowers, July, 4", HP.

-psuedo, Raineri. CAMP-42. Pkt. 35c This is a charming little plant w large open purple-blue flowers, HP, inches.

-rotundifolia, Olympica. CAMP-15.

Pkt. 25c (Blue Bells of Scotland). HP. The true Harebell bearing a mass of large light blue flowers, June-Aug., very showy, 1-ft. Extra fine variety of this species for the rock garden.

-speculum gr. fl. CAMP-16. Pkt. 10c tubinata. CAMP-45. Pkt. 40c Erect cup-like flowers of violet-blue; oneat dwarf habit, HP, 6 inches. CAMP-46. Pkt. 40c —palida.

Pale blue form with large and conspicuous flowers, HP, 3 inches. Very distinct dwarf species with pale blue flowers, HP, 1 ft.

-Rock Garden Species, Mixed. CAMP-47. Pkt. 50c.
An English grown strain of species useful for rock gardens and walls, HP, 9 inches.

CANDYTUFT.....See Iberis.

CANNA (KA-nah)

calt-2. Pkt. 50c yed flowers borne the and is particularly

CALT-3. Pkt. 50c and a center of glossy arrow-head a for a moist place brook or pool, for "HP.

Alt-5. Pkt. 50c "A pure white variety of this fine border plant. HP, 2 ft.

CALT-3. Pkt. 50c and a center of glossy arrow-head a for a moist place brook or pool, for "HP.

Alt-5. Pkt. 50c "A pure white variety of this fine border plant for sun not involve; fine border plant for sun not involve; fine border plant for sun or light shade, early summer, 3 ft., HP.

HA, 11/2 ft.

—Zebra. CHRY-18. Pkt. 10c
Beautiful hardy annual, flowers striped and blotched.

PERENNIAL BORDER SORTS:

Prefer sunny positions, blooming pro-fusely even after killing frosts. It given well drained locations and some winter protection, they are hardy most anywhere, or they can be carried over in the cold frame. Easily grown from seed from which they bloom the second year.

—Arctic Hybrids. CHRY-7. Pkt. 25c (Arctic Daisies). True Chrysanthemums of fullest winter hardiness. Single flowers in varied brilliant colorings.

-Korean Hybrids. CHRY-8. Pkt. 25c Saved from Hebe, Caliph, Daphne, Mars, Eequoia, Ceres, Vulcan, Apollo, and others of like values, including many of the ater introductions. -indicum, Double, Mixed. CHRY-12.

Early flowering double mixed flowers, bloom in autumn, HP.

Pkt. 15c; ½ oz. \$3.00

Beautiful colors in bright single flowers, coming into bloom earlier than the older strains, HP. -Saier's Early Flowering.

C. COCCINEUM—PYRETHRUM:

Formerly listed botanically as Pyrethrum roseum. They are distinguished by their long simple flower stems arising from the crown, of attractive foliage. They make excellent cut flowers as well as berder plants and are prized by the cut flower trade. Bloom late spring to mid-summer, their daisy-like flowers coming in white to lilac, rose and reds. By cutting regularly, the season can be extended till autumn. They flower the second year from seed. Space plants 1-ft. apart.

FEVERFEW: Common name for C. par-chenium, a hardy perennial of shrubby, early habitat, old time favorite. Easily grown from seed, 1-3-ft.

-Robinson's Giants. CHRY-10. Pkt. 15c; Giant single flowered, in all the best

-Market Strain. CHRY-11. Pkt. 25c: This is an extra special double market strain, and those exceptionally growing cut flowers for the market will find this an extra seller.

MAXIMUM: Known as Shasta Daisy, it MAXIMUM: Known as Shasta Daisy, it is an improvement over C. leucanthemum. It is more erect, with flower heads 2-4 inches across with many white rays. It has been hybridized much and many fine varieties have resulted. They are especially desirable for border display and very much used for cut flowers. Usually treated as biennials altho they are perennial.

CHRY-35, Pkt. 15c -Alaska. A popular cut flowered variety, good stems, pure white flowers.

erubescens. CHRY-39. Pkt. 50c Star-shaped rosy-mauve flowers, HP,

Very large pure white flowers, stems 21/2-3-ft. long. -Double Shasta. CHRY-21, Pkt. 20c A reselected strain with large double white flowers. Exhibition. CHRY-22. Pkt. 15c

A large flower. —May Queen. CHRY-23. Pkt. 15c (Spring Marguerite). Medium sized flowers on 2-ft. stems. Pretty. Mixed Shastas. CHRY-24X. Pkt. 15c:

1/2 oz. \$2.50 -aureum selaginoides. CHRT-25. (Golden Feather, Fern lea).

-aureum moss. CHRY-26. Pkt. 15c Beautiful golden foliage, 8-in. -aureum, lacinatum. CHRY-27. Pkt. 15c CHRY-28. Pkt. 10c Mixed. choice

C. FLACCIDA: -Vilmorin Hybrids. CANA-3. Pkt. 15c

The best of the French strains CARDIOSPERMUM

(kahr-di-oh-SPUR-mum) (Balloon Vine, Heart Seed). Hardy anradis and berennial vines excellent for covering wire fences or trellises, growing to 10-ft. The seed pods are inflated like balloons. Quic' growing, graceful, deeply cut leaves and small white 4-petaled flowers. Sow seed where plants are to grow or they can be started indoors. Light soil and sheltered spot.

CARD-1, Pkt. 10c: -halicacabum. oz. 40c (Love-in-a-Puff or True Balloon Vine,. Soak seeds, sometimes they require as much as 40 days to germinate.

CARDUUS (KAHR-deu-us)

(Plumeless Thistle, Silybum). Vigorous robust, spiny-leaved annual and perennial plants with purple tubular flowers, very striking in both flower and foliage, some being very ornamental, grow well in ordinary soil.

-marianus. CDUS-1. Pkt. 15c Hardy annual, white flower, 4-ft. tall. CARNATION...... See Dignthus.

CARTHAMUS (KAHR-thg-mus) (Bastard Saffron, Safflower). Spiny leaved annuals, flower heads purplish or yellow making ornamental clumps in the garden.

-tinctorius. CATH-1. Pkt. 15c (False-saffron). Produces two dyes used in commerce, HA, sow seed April where plants are to bloom.

CASSIA (KASH-ah)

-marianus.

(Senna). All are sun lovers, doing best in a sandy loam soil, very attractive with finely cut foliage and showy flowers.

CATANANCHE

(kat-ah-NAN-kee)

HP from S. Europe known as Cupid's Darts, bearing blue daisy-like flowers from June-Aug., grown both for the border and for everlastings, 2 ft.

CATHCARTII

CART-1. Pkt. 50c Poppy; culture same, as Meconopsis, ft., HP.

CEANOTHUS (see-ah-NOH-thus)

Mainly natives of Pacific Coast, orna mental shrubs, handsome, free flowering with dense panicles of small white, blu or pink flowers; not hardy in the North does best in sunny sheltered position and well drained light soil.

—prostratus. CEAN-1. Pkf. 50c
This is one of the choicest dwarf shrubs for he rock garden, flowers blue to white, sun or very light shade, gritty soils with clay or leaf mold; a creeping evergreen shrub, HP.

-pumilus. CEAN-2. Pkt. 50c

CELOSIA (se-LOH-shi-ah)

(Cockscomb, Chinese Woolflower). Popular innuals, all easily grown from seed and for early plants seed can be started indors. Do best in a fertile soil and the ditte ent types have varied uses, from pot plans to all types of bedding. The Cockscomb are the Species, argented. All the type listed as cristata, plumosa, childsi are tyms of C. argented. Start seed indoors in March to produce plants to set outdox as late in May.

CHILD SI or CHINESE WOOLFLOWER:

CLOS-1. Pkt. 10c Plants nuch branched, each tipped wit a round vooly flower, dandy for garde display and cutting, lasting well, 2-ft.

CRISTATA or COCKSCOMB:

-Dwarf En press. CLOS-2. Pkt. 15c Dark velve y crimson-maroon heads of enormous size, foliage red; a carefully rese ected strain for bedding, plants dwarf, 1-ft. The head's hold their color during winter when used as an everlasting flower.

—Pres. Thiers CLOS-3. Pkt. 15c (Glasgow Priz.)). Similar to Dwarf Empress with vel etv-crimson combs and green foliage, 10-in. An excellent dwarf strain.

-Tall, Mixed. CLOS-4: Pkt. 10c Plants tall, 11/2-ft., for bedding.

CLOS-5. Pkt. 10c -Tall Crimson. Bright crimson, uniform 18-in. plants.

-Tall Royal Velvet. CLOS-6. Pkt. 15c Rich carmine-crimson, foliage bronze-green with reddish margins.

-Finest Mixed. CLOS-7X. Pkt. 10c Dwarf varieties, best.

GILBERT'S HYBRID COCKSCOMB.

The Gilbert Celosias are all especially good for dried flowers as well as for cutting and florist use. They hold their colors well and should be grown in every Celosia planting.

—Maple Gold. CLOS-8. Pkt. 25c Lovely ball-shaped flower heads of pink tipped with gold, leaves bright green, 3-ft. Suitable for semi-tall border, very useful for cut flowers, dries well for win-ter pouquets.

Harlequin. CLOS-18. Pkt. 25c. A new introduction by Mrs. Gilbert for 1949. Bush type developing both base and side branches until it is a perfect mass of color; color starts as a pink-tipped with gold that turns to salmon then a bright shell pink when fully developed in Sept. Height 18", uniform in growth, leaves bright green. Makes a fine pot plant, lasting a long time; does not fade.

CLOS-9. Pkt. 25c Green Gold.

An unusual color combination of paster shades, ball-shaped flower heads, at first a silvery green that, as flower heads develop becomes flushed with light rose and gold, 30-in. tall, leaves bright green. Very useful as a cut flower and in the semilow corder. This is the only Celosia to date that will take a good color dye after it has been dried for winter bouquets.

—Rose Beauty. CLOS-10. Pkt. 25c
Mammoth ball-shaped combs measuring
10-16" across, a beautiful deep rose-pink
on a silver base, unusual and striking,
3-4" tall with bright green foliage, nonbranching unless pinched back; unexcelled
as either cut flower or dried for winter
bouquets keeping its rich color perfectly.

PLUMOSA or FEATHERED CELOSIA:

Tall feathery spikes in various colors. —Tall Fire Plume. CLOS-11. Pkt. 20c Red foliage, each branch ending in a great fire-scarlet plume, excellent for cen-ter of large beds, 3-ft.

CLOS-12. Pkt. 20c -Gold Feather. Bright golden yellow plumes, 3-ft.

Bland of the C. plum magnifica type 3-ft. CLOS-13X, Pkt. 15c

-Pride of Castle Gould. CLO5-14. Pkt. 15c Select strain, large fluffy plumes in scar let crimson, 3-ft.

-Fiery Feather. CLOS-15. Pkt. 25c Dwarf Florist Strain, bright scarlet plumes, for bedding or pot culture, uniform type, 1-ft. tall.

-Thompsoni, Red. CLOS-16. Pkt, 10c 30-in. tall, bright red plumes.

CLOS-17. Pkt. 10c -Yellow. 30-in. tall, golden yellow plumes.

CELMISA

— ceriacea Monroli.

A striking New Zealand plant with silvery foliage and large pure white daisy-like flowers, HP, 1½ ft.

Longifolia.

CELM-2. Pkt. 50c

Tranggia.

A hardy mountain Daisy from Tasma

CENTAUREA (sen-tau-REE-ah)

Herbaceous annuals and perennials, both Herbaceous annuals and perennials, both single and double flowers and sometimes plume or pompom-like. There are many species, all of value in the garden, all hardy and thrive in ordinary garden soil if given a sunny location. Blooming from July to frost, free flowering and make fine cut flowers. Annuals are hardy and best grown from seed sown in open ground in April, or they can be started earlier in-

CASS-3. Pkt. 20c -laevigata.

doors. The foliage types can be increased from seeds planted in Aug. The peren-nials can be started in usual manner for perennials. CENT-1, Pkt. 10c

-americana, Lilac. (Basket Flower). Bearing solitary thistle-like flowers, often 5-in. across, 3-ft. tall, hardy annual, July-Sept. - - White. CENT-2. Pkt. 10c

-argentea vera candidissima. CENT-3. Pkt. 25c Hardy perennial, 1½-ft. tall, yellow flowers and silvery leaves.

cyanus, Jubilee Gem. CENT-4. Pkt. 10c This is a dwarf, bushy, compact plan only 1-ft. high with dark blue double flowers and especially suited for edging best AleA study and a Alexand Septection of the Alexandrian flowering, hardy annual.

Polar Gem. CENT-11. Pkt. 25c.
A new white variety of same habit as Jubilee Gem.

SPECIAL STRAIN OF BACHELOR BUTTONS.

The flowers of this strain are large, fully dowble and the colors intensified. Long stems for cutting make this strain fine for florist use as well as for the garden.

Black Boy.

Rlackish maroon colored flowers. CENT-5. Pkt. 10c

CENT-6. Pkt. 10c -Blue Boy. CENT-7. Pkt. 10c -Pinkie. Deep pink. CENT-8. Pkt. 10c -Red Boy.

-Snow-Man. CENT-9. Pkt. 10c Formula Blend. CENT-10X. Pkt. 10c NOTE: Each of above, oz. 60c; 1/4 lb. \$2 Carefully hand made blend of above.

-dealbata, Rose Delight. Large and attractive flowers in mauve rose pinnate foliage, very pretty, HP 2½-ft.

CENT-13. Pkt. 10c -depressa. (cyanoides). syn. (Queen of the Corn-flowers, dark blue, HA, 1-ft.

gymnocarpa. CENT-14. Pkt. 10c (Dusty Miller). Finely cut silver-gray obliage, lavender flowers, used for foliage affect. Start indoors, tender annual, 1½: CENT-14. Pkt. 10c

CENT-16. Pkt. 10c -macrocephala. on 3-4-tt. plants, July-Aug., very showy.

CENT-17. Pkt. 10c -montana. Large brilliant blue lace flowers re-sembling the annual blue Cornflower but 2" across, June-Sept., 2-3 ft., HP.

SWEET SULTAN:

-moschata, Mixed. CENT-18. Pkt. 10c (Sweet Sultan). Fragrant, white, yellow or purple solitary flowers, 2-in. across often beautifully soft and fluffy, HA.

- The Bride. CENT-22. Pkt. 25c Large pure white flowers; a real charming variety, HA, 2 ft.

——suaveclens. CENT-19. Pkt. 10c (Yellow Sweet Sultan). HA, 2½-ft. tall, yellow flowers.

-imperiallis, Mixed. CENT-15X.

(Giant Sweet Sultan). Hybrid between C. moschata and its variety alba, fragrant flowers life soft thistles, in white, rose, ilac and blue. They add beauty to the garden and are excellent cut flowers, 2½-3-ft.. HA.

-Hardy Perennial Blend. CENT-20X. This blend contains only perennial spe

-Centaurea Blend. CENT-21X. Pkt. 10c This blend contains about an equal mix-ure of every species and variety.

CENTRANTHUS

(sen-TRAN-thus)

(Or Kentranthus). Annual and peren-nial plants of Valerian Family, very popu-lar in gaden, flowers small, while or red, and porne in dense terminal clusters. Easily grown in border.

-macrosiphon, Mixed. CRAN-1, Pkt. 10c HA pretty in masses, pink, red and white flowers, very desirable, 1-ft.

—ruber. (Red Valerian or Pretty Betsy). Swee scented, red flowers and blooms all summer, HP*, 1½ ft. CRAN-2. Pkt. 25c

A dark red variety and very useful for contrast, HP*, 1½ ft.

CEDRONELLA

(see-droh-NEL-ah)

-triphylla. Tender plant; a very fragrant herb.

CELMISIA (kla-MIS-ah)

CELM-1, Pkt. 50c A very hardy mountain daisy from Tas mania; long narrow leaves, white daisie tipped with pink or mauve, 6 in., HP.

CEPHALARIA (se-fah-LAY-ri-ah)

Annual and perennial plants blooming rom June to Aug., with flowers similar to hose of Scabiosa, useful both in the sorder and for cut flowers; colors range rom creamy-white to various yellow tints and does well in adiacry garden soil.

—tartarica. CEPH-1. Pkt. 25c
Tall robust habit; flowers sulphur colored, HP, 5 tt.

CERASTIUM (se-RAS-ti-um)

Hardy herbaceous annuals and perennials valuable for their spreading, matforming habit, and attractive silvery-white
foliage and showy white, star-like flowers.
The effect when they are in flower, is like
a snow drift which accounts for the common name of one species. May-June, 3-6
inches tall.

-biebersteini. CRAS-1. Pkt. 15c HP, white flowers, 6-in. tall, for rock garden.

CHILOPSIS (ky-LOP-sis)

CHIL-1. Pkt. 25c -linearis. Desert or Flowering Willow. Native of Texas to Calif. and Mexico. A deciduous shrub or tree to 20 ft. bearing narrow leaves to 1 ft. long and handsome crimped trumpet-shaped flowers, lilac colored with 2 yellow strips terminal racemes. strips inside, borne in shor

CHIRITA (ki-REE-ta)

Very rare and little-known relatives of -Double Mixed.

Showing and Streptocarpus, with frumpet-shaped flowers of pink, blue, purple, or pale yellow. They should be given the same treatment as Gloxinia or Saintpaulia although it is possible that some species, coming from very high altitudes, may be fairly hardy. They should be tried by all admirers of gesneraceous plants, and will probably be useful for hybridizing, as well as for their beautiful flowers.

Species.

CHIR-1. Pkt. 40c. For the strength of the stren

Species, CHIR-1. Pkt. 40c Came to us undescribed, and without ame, from India, but certainly worth - CHIR-1. Pkt. 40c growing.

CHRYSOPSIS (kris-OP-sis)

(Golden Aster). Daisy-like plants with yellow flowers on 1-3-ft. plants, at home in the dry sunny part of wild garden. Hardy perennials.

falcata. This is recommended highly as a rock anden perennial, with silky gray foliage and pretty yellow flowers, HP, 1½ ft.

mariana. CHSO-2. Pkt. 25 Large Aster-like flowers in a pretty rich yellow, blooming Aug.-Nov., HP, 1½ ft.

— villosa. CHSO-1. Pkt. 25c Gölden Aster. Yellow flowers, 1-ft. tall, May-June.

CIMICIFUGA (sim-i-SIF-eu-gah)

Tall growing herbaceous perennials with long wands of very small white flowers and very useful in the back of the hardy border or semi-shaded spots in the wild garden. Belongs to the Buttercup Family; easily grown from seed and best in rich noist soil.

CIM-1. Pkt. 30c -racemosa. (Black Snakeroot, Cohosh). A hardy showy plant best in moist soil and partial shade, flowers in long racemes of white, flowering in June or July, handsome foli-age, Sept. to severe frost, 4-5 ft., HP.

CINERARIA (sin-e-RAY-ri-ah)

(Bot. Senecio Cruentus). They are strictly greenhouse plants, altho perennials, and are grown mainly as winter flowering pot plants, new stock is grown each year. Seed is best sown April-June but also till Sept. for later flowers; soil sandy loam, containing 1/3 leaf mold. Pot up seedling as soon as large enough and keep moist and cool. Liquid manure is beneficial AFTER buds appear. Other species will be listed under Senecio, which see.

-Hybrid gr. fl. Multiflora nana, Mixed. CIN-1. Pkt. 50c

Dwarf compact plants producing masses of small flowers in a showy color range a self colors. Claimed to be the best pot

-Multiflora Maxima, Berlin Market. CIN-2. Pkt. 50c

Larger flowers and plants somewhat higher than C. multiflora nana but as rich flowering and showing the same good dis-play of colors, 15-in. tall. - multiflora nana. CIN-7. Pkt. \$1.00 A very fine English grown strain in self-colors, GP*, 1 ft.

---stellata. Star Cineraria. Very pretty small starbaped flowers in immense heads, columnich varied and very nice for cutting ap*, 3 ft. grandiflors. CIN-5. Pkt. \$1.00

A splendid English grown strain with very large flowers and fine form, in beau tiful colors, dwarf habit and compact tful colors, dwarf habit and compact clant; first quality in every way and un-urpassed, GP*, I ft.

—Siter's Rainbow Mixed. CIN-3. Pkt. 50c Hybrid gr. fl. large flower heads on compact plants in a lovely color range. -maritime, Diamond. CIN-s. Pkt. 25c

NOTE: Greenhouse growers. The Cinerarias marked GP* are all of the very highest quality for greenhouse growing and cannot be excelled; and as soon as seed can be gotten through from Germany, we also expect to have some of the finest strains grown there.

CIRSIUM (SUR-si-um)

Plumed Thistle: Rank growing prickly clants with purple, yellow, and white clowers in heads; easily grown and useful for bold effect in the wild garden.

—occidentale. CIRS-1. Pkt. 30c
Pure silver foliage and scarlet flowers;
a beautiful subject; full sun in gritty, stony
neutral soils, 2 ft., HP.

CIRS-2. Pkt. 50c -- candidissima.

CISTUS (SIS-tus)

Rock Rose. Low upright shrubs native of the Med. region, belonging to the Rock Rose Family. Bears a profusion of showy flowers but hardy only up to the central South; grown in full sun, dry light soil with lime present. The flowers are like large single roses: start blants in posts and ansplant when young and do not prune

—ladaniferus. CIST-1. Pkt. 40c Gum Cistus. Well known beautiful shrub, white-purple spots, HSh, 3 ft.

CLARKIA (KLAHR-ki-ah)

(Rocky Mountain Garland). Easily grown hardy annual, sunny locations and any light garden soil and produces graceful showy flowers in delicate rose or purple. Growing 2-ft tall it is very good for mass plantings. July-Aug. If flowers are cut in bud they last an extra long time. Clarkia is also valuable as a greenhouse flower. Best to plant seeds close to first of May, where plants are to grow, the seed can be started as early as Jan. indoors, setting plants out 9-12-in. apart.

C. ELEGANS:

-Orange King.

The commonly grown species, has smooth reddish stems and grows under favorable conditions as high as 3 ft., and more under glass. Many new varieties are being introduced both double and single, hardy annuals. CLAR-3. Pkt. 20c -Enchantress.

Double salmon-pink, large pretty flow Firebrand. CLAR-4. Pkt. 20c A brilliant copper-scarlet variety. Gloriosa. CLAR-5. Pkt. 20c A distinct break in color, a bright crim-

An outstanding variety, flowers orange mingled with rose. Mrs. Langtry.
Very popular variety. CLAR-7. Pkt. 20c

CLAR-8. Pkt. 20c

Bright orange-scarlet, brighter than Vesuvius. -Purple Prince. CLAR-9. Pkt. 20c Fine rich purple flowers, very double EXTRA.

-Rosy Morn. CLAR-10. Pkt. 20c

CLAR-11. Pkt. 20c | sphagnum. -Salmon Queen. A very pretty double salmon-rose variety.

-Scarlet Queen. Most brilliant double variety, either for (Spike Flower). Easily grown from seeds beds or for cutting, and the flowers fragrant and white, followed by attractive red berries. Use half peat and half loam for the soil.

This species has smooth reddish stems growing 3-ft. tall. Colors salmon, crimson, purple, scarlet and white. Most popular. -pulchella, alba. CLAR-2. Pkt. 10c

Lower growing than C. Elegans, and more slender leaves. This is a white variety. CLEMATIS (KLEM-ah-tis)

Herbaceous perennial or woody climbing plants of the Buttercup Family, found all over the temperate region. Thrive in rich loamy soil on alkaline side—add lime—and they respond to an annual dressing of rotted manure. There are many kinds and all are of ornamental value, the vines being especially good on fences, arbors, porches, etc. Prune those that flower on last year's wood, after they flower and those that flower from young basal shoots should be cut back to the groun each spring.

alpina. (Astragene alpina). A very conservative little climber, only 3-4 ft. long with half open 4-petalled flowers of light blue in early spring; fine for trailer in rock garden, very rare and choice, 3 ft., HP.

CLEM-2. Pkt. 25c -columbianum. Try this trailing purple Clematis with vine Honeysuckle (Lonicera Ciliosa) on a shaded wall! 10-ft., June.

We have a small amount of berries of Lonicera ciliosa, at 30c per packet while they last.

CLEM-10. Pkt. 20c -crispa. Grows well in damp places. Climber, HP.

douglasii. CLEM-1. Pkt. 25c Urn-flowered Clematis. Blue flowers, 1-2ft. tall. CLEM-9. Pkt. 25c -lingusticifolio. CLEM-4. Pkt. 25c -montana. A vigorous grower, having fragrant white anemone-like flowers in May and June; easily grown from seed.

CLEM-5. Pkt. 25c —pitcheri.

downy stalks; likes to ramble over bushes or a tall stump, 8-10 ft., HPCl.

'A loose, scrambling climber with pitchershaped blue flowers borne singly on

A low climber with large 4-petalled bell-like flowers of white, very early in Spring; will climb over dwarf shrubs or can be allowed to trail over ledges in the rock garden, 6 ft., HP.

An erect herbaceous shrub with pro-fusion of deep purple tubular or bell-shaped pendant flowers, rock garden or border, 2 ft., HP.

CLEM-6. Pkt. 40c -spooneri rosea. Rampant climber, a proportion c white from seed, HP.

CLEOME (klee-OH-me)

(Spiked Flower). Easily grown from seeds May, which germinate quickly. Thin ants to 2-ft. apart, height 45-ft., best as order subject and most desirable flower bold clumps of color in the background anting. June to frost; may be also used a hedge.

Flowers rich rose not turning to white; easy culture and blooms for months, 5-ft. -Pink Queen. CLEO-2. Pkt. 10c Clear soft pink and as flowers age turn to a pleasing apple blossom color, very

CLERODENDRON

(klee-roh-DEN-dron)

Glorybower. Most of these can be grown only in the greenhouse or outdoors only in the warmer sections, only a few can be grown in the North with some protection. Deciduous or evergreen trees or shrubs; they come from the tropics.

Seed should be sown singly in small pots, in a mixture of equal parts leaf mold or peat and sharp sand; kept moist in a temperature of about 70 degrees; when repotted soil should also contain some well rotted manure.

—squamatum. CLER-1. Pkt. 35c This comes from India and we are sorry not to have a proper description.

CLIVIA (KLY-vi-ah)

Fleshy-rooted evergreen plants of Amaryllis Family, grown in N. as house plants, in S. in shady places outdoors; they are very pretty pot or tub plants, grow in rich heavy soil and kept moist at all times. Will stand 10 degrees of frost.

—Dwarf, Royal Ensign.

GONV-1.

Bright ruby-red, rapid climber, has been sold much as Scarlet O'Hara.

—Dwarf, Royal Ensign.

Seeds cost 10c each; umbels of salmonorange flowers fading to light yellow in center, free flowering and attractive.

— Hybrids.

Five seeds to packet; hybrids, they multiply rapidly and soon from large clumps. miniata. CLIV-1. Pkt. 50c

Belgian Hybrids. Seeds 25c each Flowers mostly deep orange fading eddish; very attractive type, even out of bloom, leaves dark green and 3" wide.

-Zimmerman's Hybrids. CLIV-3 Seeds 25c each. Similar to the Belgian Hybrids.

COBAEA SCANDENS

-(koh-BEE-ah)

Climbing vine, 25-ft., growing rapidly rom seeds, best results by setting the seeds on edge when planting; in North sest to start indoors to set out after danger if frost is passed; violet-blue. It is commonly known in the greenhouse.

—Scandens, Violet-blue.

—COBA-1.

Pkt. 15c; oz. 95c

CODONOPSIS

Plants of the Bellflower Family grown in the border, some being vines. Require winter protection in the North.

(koh-doh-NOP-sis)

—clematidea. COD-1. Pkt. 30c Charming blue bell-shaped flowers with white and yellow centers, HP, 1 ft.

Flowers 6-10 in., opening at one, white with brown lip fringed with grown. COEL-1. Pkt. \$1.00

COFFEA (kaw-FE-ah)

Coffee. Can be grown in the South and in greenhouses. Their foliage is shining Very double rose-pink flowers.

COFF-1. Pkt. 50c -arabica. This is the commercial species grown for coffee.

COIX (KOH-iks)

A genus of tall broad leaved grasses.

—lachryma-jobi. COIX-1. Pkt. 15c (Job's Tears). Altho a perennial it is generally grown as an annual, not standing northern winters. Plant seed in early to mid-May in open ground. They grow 4-ft. tall; the seeds hang in clusters. If cut before seed is too ripe the grass makes fine dried ornamental grass; the seeds also can be used as beads.

COLCHICUM (KOL-ki-kum)

Autumn Crocus or Meadow Safffon. Not related to the true Crocus tho the flowers look alike. They form corms, are hardy and when established flower for years, blooming in the fall. Not hard from seeds.

—luteum. COLC-1. Pkt. 25c

COLEUS (KOH-lee-us)

Tender annuals grown only for their beautiful foliage effect, growing them from seeds is fascinating as the seedlings vary greatly in foliage design. Used for bedding and edging as well as pot plants. Sow seeds in flats indoors and transplant out when weather becomes warm; for best color grow in sun. color grow in sun.

The coloring more varied and brilliant markings of salmon, apricot, bright pink, rose, cream, carmine, bronze, purple and copper. -Avalon Strain. COLE-1. Pkt. 20c

—Glory of Vichy. COLE-2. Pkt. 20c
Large leaved with lovely color blend in apricot and copper shades. -Brocade Strain. COLE-5. Pkt. 25c

Leaves particularly large, colors rich and dark like old brocade; velvety effect. —Pyrenean Giant. COLE-3. Pkt. 20c Large robust plants, excellent for bed-ding, in lovely colors.

-Striped Empel.

COLE-4. Pkt. 20c

Vigorous grower, leaves striped with green, white, yellow and brown. -Rainbow Mixture. COLE-6X. Pkt. 20c; Hand made blend of the best kinds, including seeds saved from one of the best European collections; also contains all above offers.

-Prize Strain Mixed. COLE-7. An English grown strain, large leaves in dark apricot; rose and copper shades, HHP*, 3 ft.

COLLINSIA (ko-LIN-si-ah)

Hardy attractive free blooming annuals used in rock gardens and edgings; they are pretty, low growing plants in whorls of 5-6 blossoms and 3 or more whorls on every stem. Sow seeds outdoors in the fall and protect or sow early in the spring. Prefer a dry location.

—bicolor, Mixed. COLL-1. Pkt. 15c In rose, white, lilac, violet and blue, June-Oct., 15-in. tall.

-verna. COLL-2. Pkt. 50c (Blue-eye Mary). A sort of rarity now-adays, 2-ft., tower flower-lip bright blue, upper lip white or purplish. This seed should be planted when fresh; it is harvested in May, the crop depending upon the mice, who may be willing to work overtime, therefore, those wanting seed should place their order early, for delivery in May.

CONVOLVULUS

(kon-VOL-veu-lus) Those offered here are half hardy annuals and resemble the true Morning Glories (Ipomea) except that their flowers remain open all day; full sunshine and not too much water their only requirements. The dwarf species can be used for bedding, the tall are good for covering trellises and walls.

CONV-4. Pkt. 20c (Minor Convolvulus). Deep blue, yellow and white flowers, HA, 1½ ft. A bush growing form.

The deepest blue and brightest of all annuals, while halo and gold throat; for edging and borders they are ideal, flowering continuously all summer long, 1-ft.

-Major Mixed. CONV-2. Pkt. 10c Climbing, mixed colors. CORAL FLOWER-see Talinum.

COOPERIA (koo-PEE-ri-ah)

Prairie-lily, Rain-lily, Bulbous-rooted night blooming plants of the Amaryliss Family, delightfully fragrant, summer blooming bulbs, grassy leaves and waxy, long tubed flat flowers opening in the evening. Plant bulb in Spring, lifting them in fall and storing in dry soil so they will not dry out. They are much like Zephyranthes. Sow seed when fresh, May-Aug. -Indian Seed. COOP-1. Pkt. 50c

Seed available between May and Aug. Sow when fresh. Should be protected over winter in the North.

—pedunculata.

COOP-2. Pkt. 25c pedunculata. COOP-2. Pkt. 25c
Rain Lily. Fragrant white flowers like
Zephyranthes, blooming in summer. Can
be flowered several times during year
by alternate watering and drying; 1 it.

COOPERANTHES

Hybrids, Finest Mixed. COOP.-1.

COREOPSIS (koh-ree-OP-sis) lanceolata gr. fl.

CLAR-8. Pkt. 20c the brighter than CLAR-9. Pkt. 20c vers, very double, vers, very double, vers, very double, CLAR-10. Pkt. 20c CLAR-11. Pkt. 20c CLAR-12. Pkt. 20c CLAR-13. Pkt. 20c CLAR-14. Pkt. 20c CLAR-15. Pkt. 20c CLAR-16. Pkt. 20c CLAR-16. Pkt. 20c CLAR-17. Pkt. 20c CLAR-18. Pkt. 20c CLAR-18. Pkt. 20c CLAR-18. Pkt. 20c CLAR-19. Pk

-New Gold. CORE-1. Pkt. 10c | COTONEASTER 100% double strain. Flowers are large and fluffy, of rich golden yellow with long stems, making them ideal for cutting 2½-ft.

-Double Sunburst. CORE-2. Pkt. 10c Flowers 1½-2-in, across, beautiful golden yellow, long lasting, comes about 80% double, excellent for cutting.

CORE-3. Pkt. 10c -Mayfield Giant. Large golden yellow on a very vigorous plant, longer and stouter stems and ray petals broader.

-pubescens superba. CORE-4. Pkt. 20c A very free growing species with large yellow flowers with a dark blotch in the center, HP, 3 ft.

-Mixed. CORE-4X. Pkt. 10c: 1/2 oz. 30c

CORN—ORNAMENTAL

-Bassett's Indian Corn. CORN-1.

—Bassett's Indian Corn.

Pkt. 20c: ½ lb. 50c

This strain is the brightest and contains the largest number of colors and combinations of any strain we have ever seen. The ears are of the flint corn type, long, 10-12 rows; the kernels large flint type with all the colors of the rainbow, often as many as 10 different colors on a single ear. Colors: bright yellow, white, cream, all shades of red imaginable, blues, strawberry, even green, and these colors also in combination on one kernel. This corn is highly ornamental and used as decorations in many ways, the kernels also supplying a wide variety of colors for design work on ornamental dishes, placts, etc. Harvest the ears promptly when ripe, pulling husks back neatly and hanging them up to dry in a clean, shady, dustless place.

Strawberry Pon Corn

-Strawberry Pop Corn. CORN-2 Pkt. 15c; oz. 25c

A small red ear pop corn, just about the shape of a large strawberry and in a rich deep wine red color. It is very ornamental and can also be used for pop corn. Our strain will definitely come true from seed. The husks can be folded back when picked and the corn dried thus. when picked and the corn dried thus.

CORTADERIA

(kor-ta-DEE-ri-ah)

Ornamental grasses, sometimes classed as Gynerium, the two genera being much alike except for the flower details. They thrive in rich light sandy soils. They are not hardy in the far North, and it is best to start them indoors and transplant out after frost danger is passed. Called Pampas Grass.

CORT-1. Pkt. 15c; -argenteum. (Pampas Grass). Showiest of ornamental trasses with long silky plumes in late ummer, lasting for weeks; can be cut and tried for winter use as soon as they are ully developed. CORT-2. Pkt. 15c - roseum

 $\frac{1}{4}$ oz. 25c Same but with pretty rose tinted plumes.

CORYDALIS (koh-RID-al-is)

Easily grown annuals and perennials having interesting flowers similar to those of the Bleeding Heart; in yellow, blue, purple or rose.

CORY-I. Pkt. 20c CORY-2. Pkt. 25c -diphylla.

COSMOS (KOS-mos)

Tall half hardy annuals, very easily grown from seeds sown late in April or they can be started indoors. They thrive even in poor soil and require a sunny location; thin plants to 2-ft. apart and when a height of 2-in is reached in the seedlings pinch off the tops so as to induce side branching.

BIPINNATUS:

-Sensation Radiance. COS-1. Pkt. 20c;

Top award winner for 1948, a striking new color combination never before seen in Cosmos. Deep rose petals overlaid with a large well defined zone of rich crimson. This should be in every flower garden this year.

-Sensation Dazzler. COS-14. Pkt. 15c pretty crimson variety, 40 inches tall. —Sensation, Mixed. COS-2X. Pkt. 10c Contains all the Sensation type vari-eties, rose pink, crimson, white and Radi-

TRUE EARLY FLOWERING SINGLE

MAMMOTH STRAIN:

(Superior Garden Strain)

-Crimson Queen. COS-5. Pkt. 15c:

COS-4. Pkt. 15c; -Rose Queen. 1/2 oz. 45c -White Queen. COS-3. Pkt. 15c;

-Mixed Queen. COS-6X. Pkt. 15c; 1/2 oz. 450 -hybrid Orange Flare. COS-12. Pkt. 15c

1/2 oz. 45c Vivid orange, blooms in 90 days, 21/2-ft.

HYBRID VARIETIES:

-hybrid Orange Ruffles. Pkt. 15c

Double, vivid rich orange butterfly-like
semi-double blooms, vary free flowering.

-hybrid, Yellow Flare. COS-11. Pkt. 15c Bright clear yellow, a brand new shade in Cosmos, flowers single 2-2½-in. across on 3-ft. plants.

Double Crested, Mixed. COS-8 Pkt. 20c Extra early, with double crested flowers

-Late Mammoth Single Mixed. COS-7 Pkt. 10c

-Double Mixed. COS-13X, Pkt. 15c Peerless, Double Mixed. COS-9.

Pkt. 15c Eight wide petals with a Bachelor-but-ton-like center, a beautiful blend contain-ing crested and fluted type flowers.

COSTUS (KOS-tus)

with leaves that assume rich coloring when grown in heat, the flowers themselves are not very showy but the sterile stamen is bell-shaped and of large size, making a remarkable display. They like rich moist gravelly soil in partial shade and must be grown under glass in the North. Tropical plants related to Hedychium, ith leaves that assume rich coloring

A tall growing species, upright, somewhat woody at base, with narrow footlong leaves, silky beneath; above red bracts are borne the large flowers with bell-shaped staminodium nearly 4 inches across, white with yellowish center, grows COST-1. Pkt. 50c

(koh-toh-ne-AS-ter)

Deciduous or evergreen shrubs of temperate zone, mostly from China, belonging to Rose Family. They are very ornamental and while a little tender in the N. they stand the winters well in the central states without protection. They can be grown in pots at the start until ready to be set out in their permanent locations. Sunny locations and well drained soil.

Dwarf, evergreen type, spreading habit with white flowers. -acuminata. COTN-1. Pkt. 25c

-rotundifolia. COTN-3. Pkt. 25c COTN-4. Pkt. 25c -frigida. One of the most beautiful in flower and fruit; grows to 20 ft., not hardy in North

CROCUS (CRO-cus)

While Crocus are generally grown from corms, they can also be grown, with much interest, from seed, and especially many of the rarer spepcimens. There is also the pleasure of hybridizing. Plant the seeds in flats or pots where they can be started under the best conditions and grown on for a time in the cold frame and then later the small corms can be planted to their permanent beds.

CROC-1. Pkt. 30c -Species Mixed. An English grown strain containing many different species.

Tommasinianus. CROC-2. P.
A beautiful pale bluish-lavender.

CROTALARIA

(kroh-tah-LAY-ri-ah)

(Rattlebox). Herbs and shrubs having weet Pea-like flowers and swollen pods. est grown from seeds which must be weel Pearson from seeds weet grown from seeds water.

CROT-2. Pkt. 30c

crod rose-pink

Mottled bronzy leaves and rose-pink flowers followed by brilliamt red "May Apples." From the Himalayas, but fully hardy in the N. and happy in light shade. For a choice spot in the woodland or shaded rock garden, 1 ft. HP.

—refusa. CROT.2. Pkt. 20c (Golden Sweet Pea). Showy annual bush plant with many upright, spire-spikes of glossy golden yellow pea-like flowers, marked bronze-brown on wing reverses.

CRATAEGUS (krah-TEE-gus)

Hawthorn or Thornapple. Member of the Rose Family, nearly all hardy and they make the finest specimen trees and shrubs for the lawn. Nearly all of them come true from seed and are easily grown; the seed germinates slowly and should be sown in a flat or pot and placed

CRAT-2. Pkt. 35c -coccinea. Dark glossy leaves and large scarled fruits, HT, 15 ft.

—crus-gallii. CRAT-1. Pkt. 35c Cockspur Thorn. White flowers tinged with red. HT, 10 ft. or more.

CREPIS (KRE-pis)

Hawksbeard. Flowers are in yellow, red or orange flower heads; grown in the border and thrive in a light loam and in full sun.

CREP-1, Pkt. 20c -glomerata. Flowers arranged on large, stout conical heads, flowers yellow with 4-petalled black anthers 6-10" high; found at 10-13,000 ft. elevations.

CRAWFURDIA

Climbing gentians from the temperate regions of the Himalayas, not fully hardy and best grown, in the North, in cool house or window garden. They seem fully hardy on the West Coast, but are little known in cultivation. Treat like Gentians, giving cool soil rich in humas, plenty of water. Seed is slow of germination. Flowers are gentian-like, tubular or funnel-shaped, in blue and violet with showy fleshy red fruits.

Regarded by one of the Asiatic plant collectors as the best of the genus; has large blue or purple funnel-shaped flowers and is one of the hardiest. Twining vine,

CRAW-2. Pkt. 35c Flowers are dull greenish or yellowish, but the fleshy red fruits are particularly ornamental; vine, HHP.

CREMANTHODIUM

-thomsonii. CREM-1. Pkt. 25c Lemon-yellow flowers, 13/4" across.

CRINUM (KRY-num)

Fragrant bulbous plants, leaves thick and strap-like; they are easily grown in the S. in the open, but in the N. are not so popular as they stand little frost, they can be grown tho in tubs. They stand considerable neglect.

CRIN-2. Seeds 25c each -asiatieum. CRIN-1. Seeds 15c each

CRUCIANELLA

(kroo-shan-EL-ah)

(Crosswort). Annual and perennial plants, many of which are grown in the

CRUC-1. Pkt. 20c —stylosa.

Rock garden plant, in light soil and partial shade, while a perennial it is usually grown as an annual; prostrate habit and light growth, bearing round heads of small deep pink flowers.

CRYPTANTHE (krip-TAN-the)

(Cryptantha). Slender plants of the Forget-me-not Family, annual and peren-nial, with racemes of yellow or white Forget-me-not flowers; not common in American gardens. They are suitable for sandy, sunny exposures in the

This comes to us from India and we are sorry not to have any exact description, but it is recommended.

CUPHEA (KEU-fe-ah)

Tropical and sub-tropical plants grown mostly in greenhouses in the N. and outdoors in the S. Easily grown from seed as tender annuals.

-Butterfly Hybrids. CUP-1. Pkt. 15c At a distance the plants seem to be covered with gay fluttering butterflies. Colors lavender, white, lilac, rose, pure pink, rose purple, crimson and the most intense fire scarlet; this is one of the better annuals, 2-ft. on and the most s is one of the A lovely new form of the dwarf single type which blooms in 4 months from seed, 11/2-ft. tall,

-lanceolata.

Quite different from the Hybrid, flowers having two upper petals of velvety black marcon and the four smaller lower petals of bright crimson; a very attractive annual. -miniata Vermilion. CUP-3. Pkt. 15c

CURCULIGO (kur-KEU-li-goh)

Tropical plants of the Amaryllis Family. Palm-like dwarf plants and very useful plants in the warm greenhouse, standing dense shade; thrive in mixture of fibrous oam, old cow manure and sand.

recapitulata. CURC-1. Pkt. 50c Formerly C. recurvata. Dark green leaves 3 ft. long; the most popular species and makes fine pot plants, of palm-like appearance. CURC-1. Pkt. 50c

CYANANTHUS

Himalayan plants of the Bellflower Family having frail, almost prostrate stems, tiny leaves and in late summer quite large cup-flowers, each with five spoonshaped lobes. Mostly blue with a few less desirable yellow species. They like cool rich soil, in half shade, in the East. Fleshy rooted, they die down entirely in the winter and start growth in late spring. Not difficult when once established but often fail to come thru the first winter especially if transplanted while small, best left in the seed-pot for at least a year; a wonderful rock garden plant for northern gardens.

—lobatus. CYAN-1. Pkt. 50c

—lobatus.

One of the best with quite large blue flowers at the end of 6 inch, nearly prostrate stems set with tiny triangular leaves

CYCLAMEN (SIK-lah-men)

The large flowered Cyclamen of the florists is C. persicum. It requires 15-18 months from seed. It is strictly a greenhouse flower.

Small rose-purple flowered species, it blooms in Aug. in rock gardens and is hardy even in Canada.

-neapolitnum album. CYCL-2. Pkt. 50c Red-purple and white, autumn flowering and a good hardy species, HP, 4 inches. C. persicum giganteum:

These are the greenhouse Cyclamen. The strains and varieties we offer are the very best and most reliable. Bonfire.
Orange-scarlet. CYCL-4. Pkt. 50c

-Salmon King. CYCL-5. Pkt. 50c A grand novelty, lovely deep salmon flowers.

-White Wonder. CYCL-6. Pkt. 50c.
The largest and most free flowering white variety yet produced.

CYNO-1. Pkt. 10c -amabile, Pink. CYNO-1. Pkt. 10c (Chinese For-Get-Me-Nots). A pretty pink flowered variety in this hardy annual

-furcatum. CYNO-4. Pkt. 20c Hairy leaved, 1-3 ft. high with numer-us blue Forget-me-nots in clusters; erennial.

CYNO-5. Pkt. 20c -linifolium. Upright sprays of white Forgetme-nots to little pearl buttons; an easy annual r sunny locations, Venus' Navelwort,

CYPRIPEDIUM

(sip-ri-PEE-di-um)

The Lady Slipper Orchid, including some of our loveliest wild orchids, as well as very beautiful greenhouse species. The latter are among the most easily grown of all orchids and are particularly suited to culture by the amateur. As with all orchids, careful attention must be given to the young seedlings, but once started their demands are less exacting. See Orchids. Orchids.

-cordigerum. CYPR-5. Pkt. 50c CYPR-1. Pkt. 75c insigne. One of the finest of the greenhouse sorts, with brown to clear yellow flowers; very free blooming.

-insigne x Fairreanum.

Pkt. 75c

A hybrid between the two species, the latter from Assam which has rather small flowers with purple veined white sepols and green lip, flushed red and veined purple. Interesting variations may be expected among the seedlings. Greenhouse culture.

-villosum. CYPR-3, Pkt. 75c Very glossy brown flowers, purple at base, edged with white; greenhouse culture.

CYPR-4. Pkt. 75c -giganteum.

CYTISUS (SIT-i-sus)

Broom. Attractive shrubs belonging to Pea family. Some are hardy in N; require full sun exposure and wind, preferring poor soil and perfect drainage.

—"Porlock". CYTS-1. Pkt. 50c
Hybrid of C. fragrans x C. monspessulanus; golden flowers and very fragrant;
large shrub in mild climates, standing up
to 10 degrees of frost. CYTS-1. Pkt. 50c

DABOECIA (da-boh-EE-si-ah)

in a cool cellar or cold frame, where germination takes place in the spring of the second year, sometimes the spring of the second year, sometimes the third. The seed should be rubbed free of the pulp. This may sound difficult but if placed in a corner of the cold frame, the pot plunged to its top and covered with glass, it is easy. DAB-1. Pkt. 30c -polifolia alba.

The Connemara Heath. This is a white form, HSh, 2 ft.

DAHLIA (DAL-yah)

Growing Dahlias from seed is interesting and fascinating, the surprise of new colors and forms makes it a very popular flower grown from seeds. If seed is planted early indoors, flowers can even be had the first summer, and in most cases even from seed planted outdoors the middle of May. Set plants in the garden when all chance of frost is past, about 2-3-ft, apart. The strains we offer are of the highest variety. Both American and European seed is now offered. Of course, the tubers should be lifted early in the fall and stored indoors till spring.

Cactus Hybrids. DAHL-1. Pkt. 20c
True cactus formed flowers, seed saved from a European exhibition collection. -Collarette Hybrids. DAHL-5. Pkt. 25c

This is a Dobbie strain grown for in England, very highly recommended a containing a great range of colors, 3 —Coltness Hybrids. DAHL-7. Pkt. 25c A T&M English grown strain, an excel-lent strain of this compact growing Dahlia.

(Syn. D. Meteloides).

DELPHINIUM

Under this heading are listed the perennial species; the annuals are listed under Larkspur. Delphiniums are probably our most popular flower, especially in the better planned gardens. They really are very easily grown; fine plants require air circulation, rich light alkaline soil and good seed strains. Locate in the garden so that they have some protection from the strong winds, give space between plants, not closer than 2-ti, and if you want them for cut flowers only, plant in 3-tt, rows with plants 2-2½-ft. apart in the row. A light sprinkling of agricultural lime, with well rotted manure is best for the soil; after plants have become established a mulch over the soil is fine. Usually the plants can be cut back after flowering and a second bloom will result, a light dressing of well rotted manure at this time will benefit the plants. The best time to plant seed is about Aug. 1st. when new cropseed can be had and the plants will reach sufficient size to make the proper size for blooming the following summer; however, seed can be had and the plants will never become early spring to Sept. The handling of the seed lings and plants is the same as with any regular sowing. You will find that the varieties and strains of those we offer are the very best obtainable, regardless of the price. Those using quantities of seed for plants, etc., should write us for quantity quotations, which will depend upon time of ordering and available seed supply; it will pay you to ask.

PLANTING DELPHINIUM SEED IN THE CRIPIANC.

PLANTING DELPHINIUM SEED IN THE SPRING:

Germination can be gotten from early planted seed, Feb.-April, if you will place the seed, as soon as received, in the freezing compartment of your refrigerator for 4-6 days and then plant immediately. Prepare the soil carefully, water it well, and let stand, during this period, so that the seed can be immediately started on their mission. As a rule 5-6 inch pots are best as you are not as liable to wash seeds all around as is the case with flats. Keep glass over them but ventilate well and remove condensation daily. Remove glass immediately when germination starts. Delphiniums germinate best in the dark (cover the glass with paper) and in cool temperature, about 50 degrees.

PACIFIC GIANT SERIES: (Vetterle & Reinelt Original Seed)

One of the most popular strains at present having immense spikes 2½-3½-in. with flowers closely set which does not scatter after cutting. They come about 65% mildew resistant and 100% double; a truly remarkable strain.

Prices on all series: Pkt. 35c; 3 pkts. 90c; 1/4 Oz. \$3.50; 1/2 Oz. \$6.50; Oz. \$10.00 Black Knight Series. DELP-1. Pkt. 35c
The darkest violef. Individual flowers
2½-3 inches in diameter; of beautiful
round form, with heavy velvety texture,
which gives the color luminosity and
vividness not seen before in Delphinium.
Very long, well-formed spikes; a true
show flower with black bees.

Blue Bird Series. DELP-2. Pkt. 35c
A true blue Delphinium has been the hardest thing to produce. We can safely recommend this series as being the clearest medium blues, with white bees. They not only come true to color but carry well-formed, round flowers 2½-in. in diameter, on very long, graceful spikes. The habit is all one could desire in modern Delphinium and this series sets a new standard in blues of today.

DELP-3. Pkt. 35 The color is striking, clear medium to dark blue; very intense and alive, with dark, contrasting bee.

Cameliard Series. DELP-4. Pkt. 35c
A clear lavender self with white bee, possessing classical perfection of form of the individual flowers, which are very round and attain very large size, averaging 3-inches in diameter. Beautifully balanced spikes, combined with excellent growing habits.

Galahad Series. DELP-5. Pkt. 350 Galahad Series.

The greatest achievement in giant whites, fully worthy of its name, which possesses all the qualities one expects to find in a fine Delphinum. The standard attained in this series is perhaps responsible for the wide popularity it met, ranking in demand next to the blues. The clear white flowers, with white bees, are of large size, reaching often 3-in. in diameter, combined with glistening, heavy texture.

Guinevere Series. DELP-6. Pkt. 35c
A clear, pink-lavender self with white
bee; with very large individual flowers
averaging up to 3-in. in diameter. This is
a true exhibition type and a beautiful
garden plant.

King Arthur Series. This is still one of the most brilliant Delphiniums so far developed. The color is a rich, royal purple, with a velvety texture anl large white bee, and the beautifully formed, long spikes are carried on thin, woody stems. DELP-7. Pkt. 35c

—Percival Series. DELP.-20. Pkt. 35c Companion to Galahad Series; large glistening white flowers with strongly con-trasting black bees, beautifully spaced on

Coltness Yellow. DAHL-6. Pkt. 25c An indispensable strain for bedding, single yellow flowers, 1½ ft. —Dwarf Hybrids.

—Dwarf Hybrids.

Greatly improved Unwin type; we believe this to be the best strain of Dwarf Dahlias obtainable. Few blooms measure less than 3-in. and on 12-in. stems, profusely borne the first year. Some lovely new colors are: shades of canary yellow, scarlet, terre cotta, apricot, crimson, lavender, pink, purple, maroon, buff, cream, white, etc.

Giant Flowering. DAHL-3. Pkt. 15c Giant flowers, the seed saved from an exhibition collection.

-Mignon. DAHL-8. Pkt. 250 Very large single flowers in bright blors, 11/2 ft. -Paeony-flowered. DAHL-9. Pkt. 25c Double and semi-double flowers in enormous size, an English grown strain.

-Unwin's Dwarf. DAHL-10. Pkt. 30c Reselected and improved English strain having semi-double flowers, 2 ft.

DAPHNE (DAF-nee)

Small deciduous or evergreen shrubs specially valued for their fragrant flow-ers; thriving best in well drained sandy coam well supplied with leaf moid. Not all hardy in N.; some grown in green

Lovely clear blue.

NOTE: Those wanting first delivery in July or Aug. on new crop seed should book their orders as early as possible. The 1947 crop was the poorest in our experience very late, with the seed actually dribbling in. It was most unsatisfactory.

The following Belledonna types of Del-phinium, while not as large as the Pacific Giant Strains, they, however, are much to be preferred in those sections where the summers are hotter and not so moist. They will, in these sections succeed where the others will fail. One will just have to try them out in his own particular garden and treatment. More resistant to disease.

-belladonna, True. DELP-12. Pkt. 20c; 1/4 oz. \$1.00

Belladonna Improved. Pkt. 25c Special Strain. Clear light blue, large flower, strong grower; the finest strain Belladonna on the market.

——Azure Fairy. DELP-21. Pkt. 25c Dwarf chinensis, azure blue, 12". -Blue Butterfly. Improved. DELP-22.

Pkt. 25c Dwarf chinensis variety, ultramarine blue, 12".

DELP-18. Pkt. 35c -Blue Grotto. A deep indigo-blue variety, early, English grown, HP, 3 ft. -Cambridge Blue. DELP-25. Pkt. 25c Special strain in a rich belladonna blue.

- Cliveden Beauty. DELP-13. Pkt. 20c; 1/4 oz. \$1.50 A lovely turquoise blue, a good florist strain too. - Dark Blue. DELP-27. Pkt. 25c

--White. DELP-26, Pkt. 25c DELR-24. Pkt. 30c Belledonna type, scarlet flov -Bellamosum. DELP-15. Pkt. 15c;

74 oz. \$1.25
Rich deep blue form of Belledonna with small white bee, flowers 2½-in. across. -Hollyhock Strain. DELP-14. Pkt. 25c;

Selections of light shades, exceptionally fine for florist's use.

CHINENSIS:

While these are perennials they have the added advantage of being grown as annuals from early started seed. They are robust and sure bloomers. Popular for cut flowers. Last for many years and covered with flowers all summer and fall; rarely need staking.

A new type Delphinium Chinensis with clear bright navy-blue wide open flowers, without spurs and facing upwards making it more attractive both for a low border and for cutting. 12-15 inches tall, blooms thru a long season; a hardy perennial that blooms the first season from seed sown outdoors. -Blue Mirror. DELP-20, Pkt. 35c

-Tall Mixed. DELP-16. Pkt. 15c; oz. \$1..

2.3-ft. tall, all shades of blue and white. The tall varieties make especially good plants for cutting. -Dwarf, Mixed. DELP-17. Pkt. 15c;

About 1-ft. tall, in all shades of blue and white. DELP-19. Pkt. 50c -decorum.

Deep purple flowers, sun or half shade, rich loamy soils, dwarf, 4"-6", for the rock garden, HP. DELP-28. Pkt. 50c -incanum. DELP-20. Pkt. 50c menziesi. Deep blue flowers in dense spikes, western native species; full sun, heavy or light soil with humus, 4"-6" tall, HP.

DAHL-6. Pkt. 25c DATURA (dah-TEU-rah)

Annuals and perennials found in the warmer regions, a few being very ornamental on account of their large trumpetshaped flowers. Easily grown, treat as tender annuals.

Angel's Trumpet. A small tree with pendulous white trumpets of very large size, a musk-like odor; rather narrow leaves in pairs, one only 2/3 as long as the other. May be grown in the open in summer and intered in the cellar in the North.

DATU-6, Pkt. 30c fastuosa. DATU-I. Pkt. 10c

(Angel's Trumpet). Double Mixed. (Also known as D. cornucopia). Annual o 5-ft. with large double flowers, whitish naide and violet outside with purple

calyx. -serrata. DATU-8. Pkt. 25c

Trumpet-in-Trumpet. DATU-5. Pkt. 20c Blossoms intensely double and ruffled. Comes mostly in soft yellow, with occa-sional variations into rich cream or pure

-wrighti. DATU-4. Pkt. 20c

An easily grown vigorous annual with very large flaring trumpet flowers of palest roseate lavender, texture softly downy,

DAUBENTONIA

(daw-ben-TOHN-ya)

Herbs and shrubs of the Pea Family with leaves divided into many pairs of small leaflets. The pea flowers are borne in loose racemes, and range in color from white to yellow, red-purple, and orange red. Require indoor culture in the North, and are rather short-lived. DAUB-1. Pkt. 25c -texana.

CYNOGLOSSUM

(sin-oh-GLOS-um)

(Hound's Tongue). So called from the shape of their leaves. Annuals and biennials.

DENDROBIUM

(den-DROH-bi-um)

Epiphytic orchids, tropical, having lond drooping racemes of showy flowers in shades of rosy purple and mauve, white or pale green and having a sac or spu shades of rosy purple and mauve, winter or pale green and having a sac or spur and a lip. There are a great many species and some very popular for greenhouse growing. Divided into evergreens and deciduous, the former requiring a moist warm atmosphere; the latter a high moist atmosphere during the growing season but cooler and drier care during the late fall winter and early spring. See Orchids.

-fimbriatum oculatum. DEDR-1

Pkt. 90c Brilliant orange-yellow, with rich red-dish-brown spot on the fimbriated lip; flowers 2-3 inches across, in pendulous racemes of 6-12 blooms; deciduxus and a yery easy species for the amateur.

-nobile. DEDR-2. Pkt. 90c
A very free blooming species with large purple-tipped white flowers.

DESMODIUM (des-MOH-di-um)

Tick-trefoil or Tick-clover. Grows in dry woods and fields and may be used in the border or wild garden. Pea Family.

DMOD-1, Pkt. 35c Telegraph Plant. Grown in the green-house a lender Asiatic species with pur-ple flowers; its leaflets have the power to move in several directions; perennial grown as an annual, easy from seed.

DEUTZIA (DEUT-si-ah)

Deciduous shrubs from Asia, saxifrage Family. Very attractive shrubs, growing best in good, well drained loam; not real hardy in the North.

-corymbosa. DEUT-1. Pkt. 25c

DICENTRA (dy-SEN-trah)

Correct name for Dielytra, former name for Bleeding Heart. Charming hardy, long lived perennials; foliage fern-like, flowers dainty heart-shaped with spurred petals usually rose or pink and sometimes yellow. Easily grown from seed.

Very rare and only a small supply; much more showy than D. uniflora.

Bleeding Heart. Formally listed as Dielytra. -spectabilis. DICN-2. Pkt. 50c

DICRANOSTIGMA

Plants of the Poppy Family, with hand-some rosettes of basal leaves, and tall branching stems, bearing many poppy-like flowers. They do best in light loamy soil.

-iranchettianum. DICR-1. Pkt. 20c
A tall-growing species, with 3-inch single poppies of clear deep yellow; under glass it will flower the first season. HB. 6-ft.

DICTAMNUS (dik-TAM-nus)

The Gas Plant, a favorite in old gardens The Gas Plant, a favorite in old gardens. It makes huge clumps, with finely divided leaves and racemes of good-sized showy flowers, white or rose, with strong lemon fragrance. On still sultry evenings there will be a flash of light if a match is held close to the flower cluster. It is easy to grow, preferring a rather heavy rich soil, and resents disturbance. Seeds are slow

DICT-1. Pkt. 25c Burning Bush. Rosy purple flowers; a good border plant, resents transplanting. Seed germinate very slowly, planting them usually in the fall, an inch deep, they germinate in the spring; the plant gives off a volatile vapor.

A white flowered variety. DICT-2. Pkt. 25c

DICRANOSTIGMA

franchetianum. DICR-1T. Pkt. 25c Deep yellow single flowers, HB, 6 it.

DIDISCUS (di-DIS-kus)

DIDI-1. Pkt. 10c

BLUE LACE FLOWER. Now botanically Trachymene (tray-ke-MEE-nee). Dainty lavender and blue annual, flowers in flat head at the end of 2½-tt. stems; excellent for cutting, sow seeds early.

DIGITALIS (dij-i-TAY-lis)

FOX GLOVE. Erect biennial and perennial plants. Their stately spikes on steps 3-ft. or more high are crowded with thimble-like flowers, beautifully spotted. They are easily grown from seed sown in the spring or summer for flowers following season.

DIG-3. Pkt. 30c ikes of yellow flowers and a good naial species (Syn. grandiflora), HP

—Iaevigata. DIG-4. Pkt. 30c.
A very pretty Foxglove with bronzeyellow flowers and whitish lip, HP, 3 ft. DIG-5. Pkt. 50c A rare and attractive yellow flowered Foxglove, HP, 3 ft.

A distinct species with white flowers overlaid with golden chestnut, HP, 3 ft. DIG-6. Pkt. 40c

- maculata superba. DIG-7. Pkt. 30c Gant spotted plants in a beautiful mix-ire English grown strain, HP, 3 ft.

-purpurea gloxiniacflora, The Shirley. Giant hybrid with blotted throat, extra color range, white to shell pink to deep rose, many nicely blotched or spotted with crimson, maroon or chocolate, largest flower spikes, 6-ft.

DIG-2. Pkt. 15c

Spotted throats, extra fine.

-thaspi.

A awarf species with crimson flowers and pale throat marked with blood-red dots, HP, 1½ ft.

DIG-8. Pkt. 50c

A awarf species with blood-red dots, HP, 1½ ft.

DIANTHUS caryophyllus.

DIANTHUS - PINKS

In this classification are a great number of annuals and perennials all low growing and known under different names, viz., Darnations Pinks, Sweet Williams, Picotes, etc. They are all fragrant and beautiful flowering plants and excepting for a few Alpine species, they all can be grown anywhere, enjoying sun and a moist garden soil. The annual sorts should be planted early in the spring, either indoors or out, the perennials can be started indoors early in the spring, or sown as late as Aug., for plants old enough to winter over when they will flower profusely the following summer. Do not mulch Dianthus during the winter, they are best left alone as the crowns often rot if too much moisture collects and they can not quickly dry out.

A hardy hybrid race of D. plumarius and D. caryophyllus. Flowers from early spring till late fall in all colors except yellow; petals entire or variously fringed; have the free flowering and clove scent of the plumarius with the heavy texture of the carnations. About 25 seeds per packet. 5 for \$1.00. allwoodi.

DIAN-2. Pkt. 20c: - alpinus.

Flowers first year from seed, July-Aug.; preters lime soil, fragrant, flowers single, in shades of lavender, rose and pink and in many different colored centers, 4-8-in.

DIAN-3, Pkt. 20c -arenarius. drengrus.

DIAN-3. Pkt. 20c
Deeply fringed and richly fragrant rock
garden species, white, cream and pale
pink flowers; has sweet fragrance found
in all Dianthus, very desirable, 6-in. tall.

-caesius, gr. fl. DIAN-16. Pkt. 15c (Chedder Pinks). Tufted foliage, 3-in. all, 6-in. flower stems, bright pink daintly fringed flowers in May and June; ideal ock garden plant.

-- Hybrid. DIAN-16H, Pkt. 25c very pink hybrid of

deltoides.

DIAN-77. Pkt. 50c
(Maiden Pink). Small rosy purple flowrs; dwarf turf habit, and fine for edging
r the rock garden, HP, 6 inches.

deltoides, Brilliant. DIAN-26. Pkt. 25c (Maiden Pinks). A brilliant rich rose-pink variety, HP. Pretty, fragrant.

Crimson flowers on short erect spikes. DIAN-78. Pkt. 30c -fragrans. A favorite white single Pink, powerfully ragrant, HP, 1 ft.

-jacquimontii. DIAN-95. Pkt. 40c DIAN-42. Pkt. 20c -Knappi.

Pure lemon yellow, an unique color in Dianthus and a real addition to the flower garden; grow it with Jasiome perennis for a delightful blue and yellow effect. 18-in -latifolius atrococcineus. DIAN-43

Pkt. 15c
(Everblooming Sweet William). Double
lowers of deepest glowing crimson, erect,
ong in bloom, 1-ft.

-lieboschitzianus. DIAN-93. Pkt. 25c -monspessulanus. DIAN-45. Pkt. 25c Large tragrant flowers with deeply fringed petals, varied colors with many nice shades of pinks. Showy rock garden border or bedding plants, 1-ft.

neglectus.

DIAN-48. Pkt. 50c (Gacier Pink). Small odorless red-purple clowers, the toothed petals tawny underneath.

-nigricans. Foliage and stems dark purple, flowers dark red, HB, 11/2 ft.

DIAN-68. Pkt. 20c -nobilis. -pyridicola. DIAN-94. Pkt. 35c DIAN-90. Pkt. 30c -subacaulis.

An attractive rock garden species with pretty pink flowers, HP, 9 inches. DIAN-81. Pkt. 50c -Sundermann. A Macedonian species with large white flowers, rare, HP, 6 inches.

DIAN-83. Pkt. 35c -Species Mixed. An English grown mixture of Dianthus species suitable for rock gardens, old walls, pavements, etc., HP, 1 ft.

SWEET WILLIAM Dianthus barbatus.

While these are biennials they are best grown as hardy annuals, especially in the N. All are about 1½-ft. tall, excellent in beds and for cutting; they flower in June when cut flowers in the garden are scarce.

-Single Annual Mixed. DIAN-66 An annual flowering strain of Sweet Villiam, which if planted early will bloom

- auriculaeflorus. DIAN-70. Pkt. 25c Auricula-eyed Sweet William. The old fashioned type, grown in England, HB, 1½ ft:

DIAN-6. Pkt. 10c

Has white, rose and red shades of color one head. -Newport Pink. DIAN-9, Pkt. 10c

salmo Beautiful single

DIAN-72. Pkt. 250 -Pink Beauty. A charming strain in many shades of salmon-pink, HB, 1½ ft. DIAN-10, Pkt. 10c Purple Beauty. DIAN-10. Pkg
Bright deep purple single flowers.

-Scarlet Beauty. DIAN-11, Pkt. 10c -Single Dark Crimson: DIAN-4. Pkt. 10c

-Single Holborn Beauty. DIAN-29.

Very large eyed on pretty single flowers in mixed colors. -Single Auricula-Eyed Mixed. DIAN-5. Pkt. 10c

-Mixed Single Sweet William. DIAN-66. Pkt. 10c: oz. \$1.25

Single Dwarf Alpine Mixed. DIAN-14X. Pkt. 20c

DIAN-14X. Pkt. 20c
This dwarf, compact form of single Sweet
William is ideal for rock gardens and low
digings; the clusters of many colored
oright flowers are set snugly over the tip
if the 6-in, tall plants during late spring
and early summer; sow seed in July or
large, for the next year's bloom. Altho a
largely blennial it is usually more satisactory to make sowings annually; in falargely largely and so the live over
largely ears.

-Double, Mixed. DIAN-15X, Pkt. 10c: -Mixed Sweet William.

Some of the types are also called Clove Pinks. They are especially noted for their fragrance, the whites being the most pronounced and the reds the least. The greenhouse carnation belongs under this heading as well as many hardy sorts as listed below. As a general rule seed should be started indoors for early plants or up until Aug. for outdoor plants for the next year flowering. Space a foot apart and the larger the flower, the more necessary it is to supply supports.

Heinemann's Double Flowered. DIAN-91. Pkt. 30c

Enfand de Nice, Mixed.

This is a special new strain of the amous Heinemann Carnation, in a choice alend of colors. Extra good DIAN-17.

This is the result of a cross between Chabaud's Giant and Perpetual; the plants are robust, upright habit, with long strong stalks bearing 2½-3-in. flowers, a magnificent strain coming 75% true from seed and 90% double.

-Giant Perpetual. DIAM-18. Pkt. 25c The targest flowered clove-scented strain or garder use; similar in habit, for form, excentage and earliness to the Chabaud itant Improved. Under cold frame forcing will produce excellent commercial cut

Teicher's Biennials, DIAN-20, Pkt. 50c A large, long stemmed, hardy perential Carnation of highest merit, 2-ft.

Chabaud Giants. DIAN-21. Pkt. 35c (D. marguerite). Everblooming Carnations are as easily grown as the D. Marguerite, flowering about 6 months from time of sowing, they have the added advantage, tho, of being truly everblooming, producing without interruption during the whole summer, large and fine, very double flowers. A fine type of Carnation, 16-20-in. tall, of good habit; strong, stiff stems, colors coming true from seed and up to 95% very double flowers. Excellent for growing in pots, for beds and for cut flowers. Sow in Jan.-Feb. flowering from Lan. till winter sets in.

—Chaubaud Giant Mixed. DIAN-21T.

-Chaubaud Giant Mixed. DIAN-21T.

An extra fine English grown strain iant Carnations, excellent for cut flower iant Carnations, excellent for cut flower garden decoration, flowering in onths after sowing seed, HP*, 1½ ft.

DIAN-75. Perpetual Flowering. An especially fine T&M strain of dou

lowered Carnations, grown for us in Eng-and, mixed varieties, HP, 2 ft. Crimson Bedder. DIAN-76. Pkt. 75c A hybrid pink of great beauty, bright crimson, single flowers, HP, 2 ft.

English Giants. DIAN-67. Pkt. 50c A fine strain of large flowered hardy. Carnations in mixed colors, HP, 11/2 ft.

-Giant Double Marquerite. DIAN-22. Pkt. 25c Mixed colors, plants bloom within nonths from seed planting, HP, 18-inches Grenadin, Mixed. DIAN-28. Pkt. 25c Splendid mixture of these 18-22-in. plants, HP.

-Grenadin, Giant Malmaison. DIAN-23. Pkt. 35c.

Largest sized flowers, fragrant and one of the most satisfactory garden types.

Grenadin, Tausendschon. DIAN-19. Pkt. 50c A new variety, color varying from deli-ate rose to salmon rose, its flowers are autiless, double and regular shape, ex-ellent cut flowers, HP, 18-22-in.

Mauser. DIAN-24. Pkt. 50c
A new Swiss race, 95% double flowers, with a rich color blend, exceptionally good.

Early Dwarf Vienna. DIAN-25. Pkt. 35c Extra choice strain of double flowered bright colors and free blooming; especially good for bedding as well as cutting; while biennial, treat as an annual, starting seeds early indoors, 15-in. tall.

-heddensis, Westwood Beauty.

DIAN-30. Pkt. 15c An entirely new titraploid variety combining the large open flowers of D. heddewigi with the rugged growth and long stem habit of D. chinensis. Well formed 2-in. flowers in large numbers, stems 16-in. suitable for cutting and more tolerant of extreme temperatures than either of its parents. Color variable in red, shades of crimson and scarlet, single, lacinated, 1-ft., Hardy Annual.

- Finest Mixed. DIAN-32. Pkt. 15c; 1/2 oz. 70c

HEDDEWIGII:

Dianthus chinensis, Indian or China Pink. Introduced in 1713 and comes in various forms, double, single and lacerated and all large flowers, the best strains are of Japanese origin. Sow seeds after first of year for early flowering out of doors, from April to June for late summer and autumn flowering. They are also fine in pots carried over in cold frame and flowering from May on in 6 inch pots. All are hardy annuals and about 9 inches tall.

-heddewigi, Fireball. DIAN-33. Pkt. 15c (Japanese Pinks). Double deep scarlet. Hardy annuals.

- - laciniated Mixed. DIAN-34, Pkt. 10c -- - Double Mixed. DIAN-35. Pkt. 10c ——nobilis. DIAN-36. Pkt. 10c (Royal Pink). Flowers very large, 3-4-in., frilled and fringed in most charming colors. HA. DIAN-36. Pkt. 15c

DIAN-37. Pkt. 15c A new Swiss variety, dark red with white eye.

- Double, Mixed. DIAN-38. Pkt. 15c - Single, Mixed. DIAN-39. Pkt. 15c -Crimson Belle. DIAN-86. Pkt. 25c Flowers deep crimson, very showy variety.

-Fireball. DIAN-87. Pkt. 25c A fine double variety with rich glowing scarlet flowers. DIAN-88. Pkt. 25c

Laciniated variety with deep glowing crimson flowers. DIAN-89. Pkt. 25c -splendens. Large single flowers, laciniated, brilliant crimson, neat compact habit. DIAN-39T. Pkt. 30c

An English grown strain of single dwarf Japanese varieties, HA, 9 inches.

HYBRID PINKS:

Listed nere are those Dianthus that are nybrids of different species and not correctly listed under any species.

DIAN-79, Pkt. 70c Fine novelty in various shades and coles, continuous flowering, HP, 9 inches.

Hybrids, Highland Strain. DIAN-40.

Pkt. 25c
Beautiful strain of large flowered hardy
Pinks, vivid colorings rich in varied shades
and combinations of pink and rose; wide
assortment of beautiful forms, selfs and
zoned flowers with pink and rose tones
dominating.

-Loveliness. DIAN-80. Pkt. 70c Deeply lacinated mauve flowers, sweetly perfumed, HP, 1 ft.

-Sweet Wivelsfield. DIAN-41. Pkt. 15c A distinct race of Pinks with large flow ers in shades of pink, rose, crimson, scallet, and others with edges and centers a contrasting colors, blooming several week during summer; excellent for borders rockery, edgings or cutting, 1-ft.

——flora pleno. DIAN-82. Pkt. 50c Double form of Sweet Wivelsfield, HP 1½ ft.

-Marguerite Carnation, Saier Blend.

This is the most generally satisfactory garden variety, as it is early flowering and blooms more profusely under more different conditions. The flowers are long stemmed, double, very fragrant and in wide variety of colors; in all areas except where the winters are very severe, the plants will live over 3 or 4 years. It seed is started real early flowers can be had by fully and till frost. DIAN-44. Pkt. 25c

DIANTHUS PLUMARIUS.

(Grass or Clove Pinks). Hardy peren nials, the foliage grassy-like in strong clumps, thin wiry stems, very free flowering, fragrant. Easily grown from seed preferring well drained soil and a sunny position; excellent for edging paths. Bloomeerly June to mid-summer and if fade flowers are removed the blooming period will be lengthened.

Perpetual Dwarf Harlequin. DIAN-47. Pkt. 10c White, rose and red flowers on same flower head.

-Double Rose. DIAN-49. Pkt. 15c -Ipswich Crimson Double. DIAN-82.

A very deep crimson and a double type, HP, 1 ft. -Dwl Double Mixed. DIAN-92. Pkt. 15c A really good rosy pink double variety, HP, 9 inches.

-Ipswich White. DIAN-81, Pkt. 50c Double ivery-white, non-bursting flowers, HP, 9 inches. DIAN-84. Pkt. 60c -Mrs. Sinkins.

Large pure white double clove scendiowers, HP, 1 ft. DIAN-85. Pkt. 600 -Rose of May.

A very pretty variety with large double rose flowers, HP, 6 inches. DIAN-50, Pkt. 25c -Scotch, Mixed. -Mayflower. DIAN-51. Pkt.
Early double in lovely color range. DIAN-51. Pkt. 25c

DIAN-52, Pkt. 20c

emperflorens. DIAN-52. Pkt. 2 (Everblooming Pinks). Single, semi-dou and double flowers in fine colors, 18-in. - cyclops.

Fine single Pink, rosy-crimson with dark cone, 1-ft.

Scoticus, Mixed. DIAN-54. Pkt. 20c (Special Florist Strain). Self colors of various tints of pink, rose, salmon, and white and the same colors in combination with bright crimson zone. Blooms 1½-2-in. across, free flowering. This is the best of the D. plumarius. Stems 12-15-in.

Double, Mixed. DIAN-55. Pkt. 200 An extra fine selection of double Pinks Single, Mixed. DIAN-56. Pkt. 2 Choice blend of single flowered Pinks. DIAN-56, Pkt. 20c

sinensis, Single, Mixed. DIAN-57 (China or India Pinks). While they are thort lived perennials, they are best reated as hardy annuals. Height 12-15-in. lowers solitary, 1-in. across, in tones of ed, lilac and white, blooms all summer.

- Double Mixed. DIAN-58. Pkt. 10c hybrid, fl. pl. DIAN-59. Pkt. 20c Very large ...wered hybrids, Imperator. DIAN-6 Double giant flowers in finest mixture, HA. DIAN-60. Pkt. 20c

crimson and scarlet, single, lacinated, 1-ft., Hardy Annual.

— Schonheit. DIAN-31. Pkt. 20c

A pretty new Swiss variety just received. HA.

Made up of the more dwarf varieties especially suitable for rock garden planting. This blend contains many different kinds olus many rare and very rare sorts, difficult to obtain in any other way.

-Annual Pinks. DIAN-63. Pkt. 10c -Rare Species Dianthus. DIAN-64. —Mare Species Dianthus.

Contains many varieties of Dianthus suits able for rock gardens and many rare types not found in the regular listings, all are mostly attractive in the rockery; a wonderful collection in Dianthus.

-Mixed, Perennial Dianthus, DIAN-65. Pkt. 25c

Made up of almost all kinds, especially of surplus seeds. Suitable for those wishing a large collection of Dianthus at little cost.

DIERAMA (dy-e-RAY-mah)

Bulbous plants of S. Africa belonging to the Iris Family. Grown outdoors in mild climates or in cool greenhouses. Like all S. African bulbs they do best on the west coast. The seed can be started in flats and handled in the cold frame until large enough to put in outdoor beds.

pendula. DIER-2. Pkt. 25c Narrow leaves, lilac flowers on 4 ft. DIER-3. Pkt. 20c -Hybrids.

—pulcherrimum. DIER-1. Pkt. 25c Reddish purple flowers, tall and slender habit, HP, 4 ft. DIMORPHATHECA

(dy-mor-fo-THEE-kah) (African Daisy). Hardy annuals 1-2-ft. for sunny locations, blooming from early summer till frost; daisy-like flowers in ray and disc types, excellent for low beds and in rockery, especially for late color in the fall. In Cal. and Fla. and other milk states it is planted in the fall for winter flowers.

Deep pure orange-gold, 1-ft. —Golden West. DIM-7. Pkt. 20c (Fairy Bells). A genus of pretty peren--hybrids. DIM-2. Pkt. 15c; 1/8 oz. 35e

Containing all colors, pure white to red and bluish, including lemon, sulphur and oright golden yellow, light orange, reddish yellow and pale salmon rose, l-ft.

- Special Mixture. DIM-3. Pkt. 10c; Containing all varieties of this species.

Lemon colored flowers with blue-black central zone, pretty, HHA, 1½ ft.

S. African annual with blue and white lowers, HHA, 2 ft.

-- Salmon Beauty. DIG-9. Pkt. 25c Pretty salmon shades, HHA, 1½ ft. DIM-5. Pkt. 20c Brightest, glossiest golden orange, lowers early and continues for 3 months, altogether charming. sinuata. DIM-5. Pkt. 20c

-All Mixed. DIM-6X. Pkt. 10c; 1/2 oz. 75c

DISPORUM (dy-SPOH-rum)

Fairy Bells. Genus of liliaceous perennial plants of Lily Family with drooping white or yellowish flowers found in woods. The flowers are followed by attractive red or yellow berries. Very lovely in the wild garden, especially. Similar to Solomon's Seal.

oreganum.

Creamy white flowers, 2-ft. tall. DISP-1. Pkt. 20c

DODECATHEON

(doh-de-KATH-e-on)

American perennial plants of Primrose Family, basal leaves and nodding Cyclamen-like flowers in rounded clusters. Flowers are white, rose or purple with reflexed petals. They grow naturally in half shaded woodland or rather damp mountain meadows, thus should be given moist, rich soil in partial shade in rock or wild garden or naturalizing, all with good drainage.

One of the finest of all the species with large heads of pale lavender to crimson flowers; easily grown in the less arid parts of the rock garden, sun or part shade; heavy to light woodland soils, 4-6" tall, HP. -hendersoni.

Native of Mont. smooth light green leaves, pink or rose-red flowers on stout stem, 2-ft. tall, May-June, a fine one for a cool wet place in the garden; blooms at 6-in.

DOLICHOS (DOL-i-kos)

Rapid annual climbers, 10-ft. or more with Wisteria-like flowers of red or white followed by attractive pods; do not trans-plant. HHA.

Chinese. DOLC-1. Pkt. 10c A new type. DOLC-2. Pkt. 15c -lablab. (Hyacinth Bean). Violet vine.

Pkt. 15c Dark leaved vine with purple flowers.

-Mixed Dolichos. DOLC-5X. Pkt. 10c;

DORONICUM (doh-RON-i-kum) (Leopard Bane). Perennial daisy-like yellow flowered plants, blooming very early in the spring. Prefers rich loam but thrives in any good soil.

-caucasicum magnificum. Pkt. 15c Showy border plant with large yellow flowers, May-June, 11/2 ft., HP.

DOUGLASIA (dug-LAS-i-ah) Small alpine plants of Primrose Family and differing from Primulas and Androsace mainly in having a branching growth. Flowers yellow or rose, solitary and in somewhat rounded clusters, suitable for rock garden. Plant in pockets of well drained soil which must not be allowed to entirely dry out.

—montana.

DOUG-1. Pkt. 35c.

Moss Pink. Native of Mont, difficult un-

montana.

DOUG-1. Pkt. 35c

Moss Pink. Native of Mont. difficult unless suited to soil, but there hardly is
anything better if it does well, prefers
scree soil or wall, 2-in, tall, April, pink
flowers.

Compact cushions covered in early
ching by abundant bright rose-pink
flowers on one inch stems; hardy perennict.

DOUG-2. Pkt. 25c -vitaliana.

DRABA (DRAY-bah) Small tufted hardy annuals and peren-nials, useful in the R.G. and having a neat habit. Flowers early, best in porous soil and sun.

-fladnizensis DRAB-1, Pkt. 25c -olympica. DRAB-2, Pkt. 25c

DRACAENA (drah-SEE-nah)

Ornamental plants with brilliant and often variegated foliage belonging to the Lily Family. They are tropical plants and ordinarily grown in greenhouses. D. cordyline is the most common and sold as Dracaenas. Grow in rich soil, plenty of heat and moisture to promote a quick growth. Good light is required during winter for bright colors. Dracaena seed requires several months or nearly a year to germinate and should have warm house treatment.

-Indian species. DRAC-2. Pkt. 50c Hardy tropical foliage plant with colore foliage and very useful as a decorative pot plant; requires warm house treatment

indivisa. DRAC-1. Pkt. 15c; ex. 65c (Properly Cordyline indivisa). The hardiest of the group, sword-like green leaves, 2-3-ft. tall, used much us centers for baskets, window boxes, etc.

DRACOCEPHALUM

(dray-koh-SEF-ah-lum)

(Dragonhead). Hardy annuals and perennials with blue, purple or white flowers borne in whorls in the axile of the leaves or in spikes. They make pretty groups in moist shady places in the border. Easily grown from seeds. If in an exposed hot position the flowers are fleeting.

disc types, excellent for low beds and in rockery, especially for late color in the fall. In Cal. and Fla. and other milk states it is planted in the fall for winter flowers.—aurantiaca, Orange Improved. DIM-1.

-calendulacea, Lemon Queen. DIM-10.

DRYMOCALLIS (dri-mo-CAL-lis) ERINUS (e-RY-nus)

Western plants very close to Potentilla and looking exactly like them except to the botanist. They have deeply gashed leaves and sprays of yellow or white strawberry-like blossoms. They are interesting plants for the rock or wild garden but not showy enough for the herbaceous border; easily grown from early planted see is.

DRYM-1. Pkt. 25c One of the taller species for the back of the rock garden or for a sunny spot in the wild garden; flowers yellow, about 34 inch across in broad branching sprays; leaves are quite attractive, HP, 2 ft.

DYCKEA

-sulphurea.

DYCK-1. Pkt. 25c

ECHEVERIA (ek-e-VEE-ri-ah)

Succulent having leaves in rosettes and small flowers usually in spikes. Grown indoors in pots and sometimes bedded out in summer. Require a light, sandy soil, excellent drainage. Handle like succulents.

-giorgis.

ECHV-1. Pkt. 50c

ECHINOPS (e-KY-nops)

(Globe Thistle). Thistle-like perennial and biennials with flowers in round heads. They are very decorative in the border and easily grown from seed.

—niveus. ECHN-2. Pkt. 25c Large heads of white flowers and silvery foliage, HP, 5 ft. Free flowering annual, white flowers with blue zone, HHA, 9 inches.

-ruthenicus. Similar to E. ritro ECHN-3. Pkt. 25c Similar to E. ritro but less robust, a very fine blue, HP, 5 ft.

ritro. ECHN-1. Pkt. 15c
Small globe thistle with finely cut, white
downy leaves and steel blue flowers,
blooming all summer, perennial, 2-ft.

ECHIUM (EK-i-um)

(Vipers Bugloss). Annual, biennial and perennial plants of Borage Family. Purple, rose or white flowers in coiled racemes or shown spikes. Thrive in poor soil in open sunny locations, producing only leaves if too rich. Some of the species are very popular in Cal.

-vulgare, Blue Bedder.

ECHM-2.

A new compact variety with deep bright blue flowers, HP, I ft.

EMILIA (e-MIL-i-ah)

(Tassel-flower, Floras Paintbrush). Annual and perennial plants of low, neat habit native of the tropics. The slender stems are tipped by small, rayless, many colored flower heads surrounded by soft, white bristles resembling tiny paint brushes. Grow in sunny places, July-frost. Treat as half hardy annuals. Formerly listed as Cacalia.

-sagittata lutea. EMIL-1. Pkt. 15c
Popular annual garden species, to 1½-ft.
with yellow flowers in loose clusters.

EMIL-2. Pkt. 15c Same but with red flowers

-Mixed. EMIL-3X. Pkt. 15c Exceedingly gay flowers that seem to have been dipped in paint of vivid red, yellow, others in golden orange with red dominant, 1½-ft.

ENKIANTHUS (en-ki-AN-thus)

Hardy deciduous shrubs of the Heath Family, native of Asia. Attractive, upright growth with whorled branches; long slender clusters of nodding flowers in spring, showy and suggest the common name, Necklace-bush. Thrive in moist sandy loam with peat or leaf mold; easily grown from seed

-himalaiens. ENKI-1. Pkt. 25c

EPILOBIUM (ep-i-LOH-bi-um)

Willow-herb. Easily grown plants with willow-like leaves; they have white or yel-lo flowers and long fruit pods or capsules, HP.

EPIL-1. Pkt. 25c

EREMURUS (er-e-MEU-rus)

(Desert Candle, Foxtail-lily, Giant Asphodel). The hardiest of the tall desert members of the Lily Family. They are most spectacular. The flower stalk, in some species, rise as high as 8-ft. and clothed for half its length in close-set starry blooms, lasting for several weeks. Becoming more popular both in border and as florist flower. A rich, fibrous, well drained soil with sand and a sunny location are essential. The seedlings develop slowly. For winter The seedlings develop slowly. For winter protection a covering of leaves with a water-tight box over them is ideal.

-Finest Mixed. EREM-1. Pkt. 20c EREM-2. Pkt. 35c Very hardy pure white variety with very long spikes, HP, 5 ft.

-hybridus. EREM-3. Pkt. 60c Wallace's famous strain of English grown Eremurus, HP, 6 ft.

EREM-4. Pkt. 50c -robustus.

--- Elwesianus. EREM-5. Pkt. 50c A splendid new form of E. robustus, larger in all parts, HP, 10 ft.

ERIGERON (e-RIJ-er-on)

Aster-like annuals and perennials known as Fleabane, flowers in heads with white rose or violet ray-flowers and yellow disc flowers. Plant in warm sandy soil in full sun. Fine for the border, some for the wild garden, and a few are grown in the rock garden. Easily grown from seed.

-compositus. ERIG-4. Pkt. 25c Has feathery gray foliage, pale lavender flowers, 2-in. tall.

ERIG-3. Pkt. 200 -concinnus. Native of Mont. and Wyo., small blue, 8-12-in, tall, May-Aug. Easy to grow.

ERIG-2. Pkt. 20c -coulten.
Native of Mont., large white flowered becies of the moist woods, 8-12-in. tall.

ERIG-5. Pkt. 25c Pale blue flowers and smooth foliage, one of the best of taller species and fine mucronatus. ERIG-6. Pkt. 25c (Syn. Vittadenia triloba). Flowers white changing to rosy pink, HP, 6 inches.

multiradiatus,

Flowers deep violet-blue with dark bronzy black cone in center; 4" tall, found at 10-12,000 ft., fine for Rock Garden.

Hardy European mountain perennial commonly grown in dry rock wall or crevices in the rock garden, blooming in April, flowers small red-purple and rising 3-4 inches above the matted foliage; excellent rock plant and for pots, HP, 6 inches.

ERIN-1. Pkt. 25c

ERIOGONUM (er-i-o-GOH-num)

Herbs and sub-herbs native of the west-ern U.S. Require well drained peaty soil and sunny location; grown in the rock garden.

-flavum, piperi. EGON-5. Pkt. 25c Native of Mont. medium green leaves with yellow flowers, 8-in. tall, April-May -microthecum. EGON-4. Pkt. 25c

—microthecum. EGON-4. Pkt. 25c Good. Native of Mont., gray-white mounds supporting many white to rose flower heads, best in scree soil with best of drainage, 6-in. tall, April-May.

EGON-6. Pkt. 35c Grows on hot dry rocks or poor gravelly soils; one of the easiest species, very mandsome and showy, yellow heads of 12" stems, a good companion for Limoniums (Statice), HP.

pyrolaefolium. EGON-2. Pkt. 25c Dwarf, heads of white to red flowers on short stems; dry sunny location in R.G.

ovalifolium. EGON-3. Pkt. 25c A lovely R.G. species with silver leave a dense mound and almost stemles all-shaped flower heads, white turning to the and rarely rich red; sun, dry soil 6 in., HP.

subalpinum. EGON-1. Pkt. 25c Native of Mont.., largest yellowish white lowers turning rose with age, 1-ft. tall

ERIOPHYLLUM (er-i-oh-FIL-um)

Annual and perennial herbs and sub-nerbs native to Western N. Am., of Daisy Family. Widely grown in dry places.

-intergrifolium. ERIO-2. Pkt. 25c Small Oregon Sunshine. Worth its weight in gold when happy golden flowers, 6-12-in. tall, May-Aug.

ERIO-1. Pkt. 25c —Ianatum. ERIO-1. Pkt. 25c Oregon Sunshine. Native of Mont. and erry good, gray-white foliage an likes the gravelly soil of a rock slide or road band, thort lived but reseeds itself. Golden lowers, 12-18-in. tall, May-Aug.

—lanceolatum, ERIO-7. Pkt, 50c
Alpine Oregon Sunshine. Grows on hot rocks in crevices; dense wooly foliage, profuse blooms of yellow flowers; a real gem for the rock garden, 2-4" high, HP.

ERIO-6X. Pkt. 15c

ERODIUM (e-ROH-di-um)

A genus of the Geranium Family of annual and perennial species; they re-quire a gritty loam soil with lime in it and a sunny position in the border or lock garden. They have a long blooming

EROD-1. Pkt. 25c White flowers, gray foliage; a distinct and beautiful species, HP, 6 inches.

White flowers, with dark blotch at base pelargoniiflows.

—pelargoniiflorum. EROD-3. Pkt. 25c Flowers spotted; leaves large and ounded, HP, 6 inches.

ERYNGIUM (e-RIN-ji-um)

(Sea-holly, Eryngo). The steel blue or gray foliage of the larger species is most attractive in the border and the smaller tinds are very suited for the rock garden; he taller types furnish excellent cut lowers which can be dried for winter bouquets; plant in a light rich soil in an appen sunny location. Mostly perennials.

-alpinum superbum. ERYN-2. Pkt. 20c Light blue, June-July, germinate cool, in light. Annuals, biennials or perennials, summer blooming, belonging to Gentian Family. Flowers white, lilac or purplishblue, flat petalled in branching clusters at top of the leafy stems. Grown as pot plants but hardy in the South; sow seed in light well drained soil in March or for large specimens in Aug. for next season; shade from hot sunlight.

-giganteum. ERYN-1. Pkt. 25c A robust border species, involucrum ivory-white, HP, 3 ft.

giganteum. ERYN-1. Pkt. 20c (Silver-thistle). HP, 3-ft. tall.

-oliverianum. ERYN-3. Pkt. 25c Spiney foliage; flowers, bracts and stems blue, the flowers 1½ inches long, surrounded by the very narrow stiff bracts, HP, 2½ ft.

ERYSIMUM (e-RIS-i-mum)

Closely resembling. Wallflower, commonly known as Blister-cress, having white, yellow or lilac flowers, the smaller species being excellent rock garden and edging subjects for sunny positions, sow edging subjects for sunny positions, sow the annuals where they are to remain. Easily cultivated.

(Siberian Wallflower). Sometimes listed under Cheiranthus. Dwarf compact deep orange reselected. HA, 1-ft.

nana compacta. ERYS-5. Pkt. 20c
Saffron-yellow colored flowers on compact dwarf plants making them a very
desirable dwarf variety.

— Golden Bedder. ERYS-3. Pkt. 15c A new, very desirable variety, HA, 1-ft.

-perofskianum. ERYS-2. Pkt. 15c (Blister Cress). Hardy annual, orange yellow flowers.

ERYS-4. Pkt. 25c Western Wallflower. Biennial, native of Mont., orange-yellow flowers, 12-18-in. tall, April-June.

ERYTHRINA (er-i-THRY-nah)

Coral Tree. Thorny trees of the Pea Family, grown in the open in the South, they are easily grown from seed. They have attractive flowers.

-arborens. -Indica.

ERTH-1. Pkt. 25c ERTH-2. Pkt. 25c

ERYTHRONIUM

(er-i-THROH-ni-um)

Dog's Tooth Violet, Trout Lily, Adder's tongue. A genus of early spring-blooming bulbous plants of the Lily Family, with graceful nodding flowers and often richly mottled leaves. They are especially attractive in the rock garden or naturalized in masses in light soil, partly shaded such as would be found at edges of woods. Give mulch of leaves in winter.

ERYT-3. Pkt. 25c grandiflorum. ERYT-1. Pkt. 25c (Glacier Lily). Green leaves, bright buttercup-yellow flowers. 2-ft. HP. One of the easiest species, especially in the East; large lavender and purple flowers, 1-8 to the stem, full sun or part shade, will stand heavy clay woodland soils; fine for naturalizing where it self sows, also for rock garden.

(esh-SHOLZ-zi-ah)

-Cal. Hybrids. ESCH-1, Pkt. 10c;

Erect compact hybrids mixed, HA, 15-in.

Mixed varieties in brilliant colors, HA 12-in. tall.

(eu-pah-TOH-ri-um)

A large genus of the Composite Family aving ornamental plants for the border, wild garden and greenhouse. They are asily grown from seeds and do best in a light ordinary garden soil.

bushy annual much like the Poinsettia, leaves ending in a whorl of fire-scar-leaf-flowers; easily grown, start seeds

EUPHORBIA (eu-FAUR-bi-ah)

A large genus consisting of many dif-erent types of plants having a milky juice. hey thrive in a porous and not too rich oil.

Fraseri.

A good white and fine for cut flowers HP, 1½ ft.

"Snow-on-the-Mountain". An old garden vorite with distinct green and white aves which add color to the border or

ackground planting; easily grown from eed, sunny locations, annual, 3-ft.

Globes of golden floral leaves early in the spring, followed by attractive red seed apsules, plants turning crimson in aut mn; 15 in. tall, HP.

—alatus. EUON-1. Pkt. 50c
One of the finest species, broad winged oranches, with leaves turning to brilliant trinson in the fall; small but showy brilliant purple fruits, 8 ft., hardy shrub.

EVODIA (ee-VOH-di-ah)

EXACUM (EKS-a-kum)

(ek-soh-KAUR-dah)

Best of the group with large white flow ers, HSh, 10 ft.

Only species of this genus, belonging to Rose Family. Low spreading deciduous shrub with white flowers, later attractive heads of feathery-tailed fruits; hardy to Mass., requires a well drained limestone soil, warm position, easily grown from seed.

Yellow flowers and small honesty-like seed pods, HP, 1½ ft.

Natives of Africa, plants and sub-shrubs the latter being grown under glass or in the Southern parts of the country; the mnuals are easily grown from seed and tine for filler in the rockery.

bergeriana. FELC-1. Pkt. 75c (Kingfisher Daisy). Low spreading annual with bright blue star-shaped flowers, a gem for the rock garden, HA, 2-inches.

The Fig. Trees, shrubs and woody ines from the warm regions. Grown as rnamental plants in the greenhouse or utside in the warmrer parts of the

elastica. FIG-2. Pkt. 35c
The popular "Rubber Plant," with
nacked stems dotted with long shining
leathery leaves; will stand much abuse
as a house plant, requiring little light.

FELICIA (fe-LISH-i-ah)

FALL-1. Pkt. 25c

FARS-1. Pkt. 25c

FIG-1. Pkt. 30c

FALLUGIA (fal-00-ji-ah)

-teres.

-Wilsoni.

-paradoxa.

FARSETIA

ountry.

bengalensis.

EXOCHORDA

EUONYMUS (yu-ON-e-mus)

EUPH-1. Pkt. 15c

EUPT-2. Pkt. 25c

EUPT 3. Pkt. 20c

EUPT-4. Pkt. 25c

EUPATORIUM

-cannabinum.

-polychroma.

ESCHSCHOLTZIA

FRYT-2. Pkt. 50c species, especially ender and purple, full sun or part by clay woodland synchron tracks.

FIG-3. Pkt. 35c The Peepul Tree of India. Its rounded leaves, with long tail-like appendages, rustle in the slightest breeze; hardy in southern Calif., elsewhere a greenhouse land Chief.

FIG-3. Pkt. 35c These are considered fin flowers; sow seed early in southern Calif., elsewhere a greenhouse land Chief.

FOR-GET-ME-NOT. See Myosotis.

FRANCOA (fran-KOH-ah)

FRAN-1. Pkt. 25c -ramosa. (Bridal Wreath). Pure white flowers and very neat species, HHP, 21/2 ft.

(California Poppies). Hardy annuals and perennials, usually grown as annuals. Usually low and spreading, but some grow to 2-ft. tall. The flowers, unlike other poppies, are slender rather than cupshaped. They make attractive border flowers in groups, bloom profusely all summer and till frost. They thrive in ordinary garden soil and are easily grown. Sow seed direct in garden early in spring, or later sowings can be made. This plants to 6-in. apart. They do not stand moving. Often by winter mulch, the plants can be saved for flowering the next spring. —Cal. Hybrids.

Ash. All are easily grown from seed.

FREESIA (FREE-zih-ah) -Spreading Varieties. ESCH-2. Pkt. 100;

-hybrida tubergeni, Choice Mixed.

—Luzi. FREE-2. Pkt. \$1.00
A new type that excels the many older and newer kinds that are on the market. The flowers are very large, as much as 1½ inches or more (7 cm); are larger than any other type. Flowers are especially well formed and wide open. The colors are very rich and from pure white and cream to clear yellow and into dark yellow, orange to dark orange, all shades of blue and violet, pinks and reds, with some new shades of red. These colors are extremely bright; growth strong, flowers attaining a height of 80 cm. or 30 inches with 3-4 long shoots per sprout, each sprout having as many as 40 flowers. FREE-2. Pkt. \$1.00 -Luzi.

FRITILLARIA (frit-i-LAY-ri-ah)

A genus of bulbous plants of the Lily Family with drooping bell-shaped flowers, often checkered in greenish, purple or brown. While they are usually grown from bulbs, there is a great deal of added pleasure in growing them from seed. The soil should be rich. Seed can be started any time during the first half of the year.

acmopetala. RIT-11. Pkt. 50c
This species bears one or two quite
arge flowers of olive-green and purple,
above short basal leaves; rare and hand-

Shrubs and small trees with very hand-ome foliage and showy fruits in fall; not articular as to soil; easily grown and best saults will be had by planting seed in all to winter over and germinate in A handsome red variety of the Crowing imperial, having become quite rare and expensive since the war; plant in borde where it is sheltered from strong winds it. HP. This is an extra large red form

A large white-flowered form, lovely in masses, very easy and hardy, for shady place, 2 ft., HP.

Deciduous and evergreen shrubs and trees native of Asia and Australia, belonging to the Rue Family. They are not common; easily grown from seed in ordinary garden soil. Some are not hardy in the N. They have handsome compound and aromatic leaves and small whitish flowers borne in panicles, followed by showy black seed pods. —pallidiflora.
Pale yellow flowers spotted inside, glaucous foliage, HBb, 9 inches. FRIT-8. Pkt. 25c

FRIT-12. Pkt. 75c tuntasia.

-Mixed.

NOTE: We should be able to add to the above list some 10 more species of which we are not sure of delivery as this is written. EXAM-1. Pkt. 50c

FUNKIA (FUNG-ki-alı)—see Hosta.

Pearl-bush. Hardy deciduous shrubs be-longinig to the Rose Family and native to Asia. Grow best in rather light soil, a sunny location. The flowers resemble some of the Spireas and they are among the most attractive spring flowering shrubs. They are easily grown from seeds. EXOC-1. Pkt. 35c

> GAGE-1. Pkt. 40c -species.

One of the last plants to die in the autumn. Flower heads often 4-in. across, ray flowers yellow. Perennial, to 3-ft. GRANDIFLORA. Hardy perennials. These have been so improved that their flowers are most valued.

—The Dazzler. GAIL-1. Pkt. 10c Large flowered, intense golden yellow with maroon-red zone. GAIL-2. Pkt. 10c

A Swiss variety, red flowers with gold zoning. -Monarch Strain. GAIL-10. Pkt. 15c

GAIL-3. Pkt. 15c Flowers 3-4-in. across, brilliant scarlet intensified with bronze gold tips, semi-flouble, 2½-3-ft. talk.

Mixed. GAIL-5X. Pkt. 10c; 1/4 oz. 40c Mixed grandiflora varieties only.

—superba, Mixed. GAIL-7. Pkt. 10c A beautiful strain in large flowers, much like the grandiflora mixed.

These are considered first class cut flowers; sow seed early in the spring. HA, common name Blanket Flower.

-Indian Chief. GAIL-8. Pkt. 10c:

Pretty deep coppery scarlet accentuated by a dark brown center, dense, 1-ft., bushy plants.

Double Mixed. GAIL-9. Pkt. 15c; ½ oz. 60c The double kinds are considered extra fine for cut flowers.

GALEGA (gah-LEE-gah)

Bushy perennials with white, blue or purple pea-like flowers in thick clusters, fine for cutting.

Officinalis, Mixed. GALG-1. Pkt. 10c (Goat's Rue). White, lilac, and rose.

—persica. GALG-2. Pkt. 25c

Pure white suitable for the back of the porder and a very desirable species, HP,

GALTONIA (gaul-TOH-ni-ah)

Giant Summer Hyacinths. So. African bulbs of the Lily Family producing in midsummer tall spikes bearing fragrant white or greenish drooping bell-shaped flowers. They are not hardy in the North and should be dug in the fall and stored indoors; in milder sections they be grown as perennial, especially with some winter projection.

-candicans. GALT-1. Pkt. 25c Large Snowdrop-like flowers in long racemes, HBb. 3 ft.

GAMOLEPIS

—tagetes. GAMO-1. Pkt. 20c
Hardy annual from Europe, very early flowering, dwarf, flowers yellow.

GAULTHERIA

(gawl-THEE-ri-ah)

(gawl-THFE-ri-ah)

Evergene woody plants of the Heath Family having rather small white, blue, red or black flowers. Most species are quite dwarf, some even prostrate, and are suited to the rock garden or the front of evergreen plantings; all are very desirable and very popular with collectors of ericaceous plants. The native Wintergreen is G. procumbens. Give the same treatment as Heaths and Rhododendrons, sandy peaty soil with plenty of moisture, pest in light shade. Most species are not fully hardy in the North and must have protection.

GAUL-1. Pkt. 50c A rare species from the Himalayas, apparently not in cultivation here as yet. The seed was just received from our collector in India. -trichophylla. GAUL-2. Pkt. 40c

Flowers bell-shaped, 1/4" across with 5 lobes in rosy red, calyx 5-lobed. GAURA (GAU-rah)

Perennial N. Am. plants with spikes or clusters of rose or white flowers tor the border or wild garden.

—lindheimeri.

—Rative of La. and Texas, flowers white with rosy cups, HA, 4-ft., perennial in dry soils.

GAZANIA (gah-ZAY-ni-ah)

Old time favorites for flowering in the greenhouse or for bedding outdoors during the summer; they have narrow leaves in varying forms mostly covered beneath with dense white woolly hairs; colors range from white, thru orange and yellow to scallet, beautifully spotted at the base of the petals; sandy loam with humas, a sunny location suits them best.

GAZ-1. Pkt. 20c Hardy perennial, its trailing habit makes it a good rockery plant; flowers bronze, red, orange, yellow, cream, and white with brown and yellow spots about the center; flowers first summer and also a favorite in the cool greenhouse, 12-ft.

GENISTA (je-NIS-tah)

Broom. Deciduous and half evergreen shrubs, closely allied to Cytisus, oinamental with showy yellow or white flowers and well suited for dry sandy soils in mild climates, especially on sunnybanks; most are not real hardy in the North.

-prostrata. GNIS-1. Pkf. 30c

GENTIANA (JEN-shan)

All require good drainage and resent hot weather. Best started from seed which should be as fresh as possible, seeds are very small and usually slow to germinate. Some of the finest blues are found in the group and the plants are so beautiful and interesting that they will repay the trouble taken to grow them. We might suggest that you may place your order in advance for delivery as the fresh seed comes in. Some come from India.

GENT-11. Pkt. 35c -armenum. GERN-5. Pkt. 25c Dark red flowers, robust habit and a fine border plant, HP, 1½ ft.

A rare and distinct species having dark blue flowers, HP, 1 ft. -decumbens. GENT-12. Pkt. 35c -moorecraftiana. GENT-2. Pkt. 25c

Plant with ascending many branches bearing beautiful funnel-shaped sky-blue flowers. -quadriferia.

Dwarf plant bearing numerous stray blue flowers. -Rochelli. GENT-8. Pkt. 25c

A strong growing species with clusters of blue flowers, HP, I ft. -septemfida. GENT-9. Pkt. 30c Fine blue flowers on stems up to 10". let with pairs of leaves at short intervals; leoming in July-Aug. HP.

-sikkimensis. GENT-10. Pkt. 50c One of the easiest species making mats of many shoots up to 6 inches tall. Flowers are rather tubular, about 3/4 inch across, blue with white throat.

-stylophora. GENT-6. Pkt. 50c A 'all species, sometimes 6 ft. with leaves up to a foot in length and 5 inches across; flowers are widely funnel-shaped and up to 2 inches in length and strawyellow. A very stately plant for the shady border, in rich soil; it may be slightly tender in the North.

-tonglensis. GENT-3. Pkt. 25c A much branched tail plant, flowers funnel-shaped, blue.

Perennial plants native of Chile and having mostly basal leaves. Belong to the Saxifrage Family; useful border plants in mild regions or they can be grown in the cool greenhouse. Soil, loam and peat.

FRAXINUS (FRAK-si-nus)

FRAX-1. Pkt. 35c Native of Texas, street tree

-berlanderian. FRAX-2. Pkt. 35c Small ornamental street tree of quid growth, native of Texas.

Those having heated glass houses can grow the hybrid Freezias. There is plenty of interest in them, and the seed can be sown anytime; in So. Cal. they can be grown out doors, planted in early fall, where they make lovely garden flowers.

Large flowered, displaying a beautiful range of bright colors. Saved from the finest collection in existence, European grown.

-imperialis rubra. FRIT-10. Pkt. 50c

—pudica. FRIT-I. Pkt. 20c Yellow Bell. Earliest spring flowers, yel-low 6-8-in. tall, April.

EVOD-1. Pkt. 25c FRIT-9. Pkt. 25c Flowers plum-olive color, beautifully reticulated brown, HBb, 1½ ft. roylei. FRIT-4. Pkt. 2 Yellowish green, streaked with purple FRIT-4. Pkt. 25c

-tuntasia.

A very rare species, long lost to cultivation, a tall species from the Cyclades, with loyely metallic black flowers borne on ft. high stems, and coming from stony millsides. Probably will be fine in the rock garden, HP.

Small bulbous plants; Lily Family; for-nerly classed under Ornithogalum. The tardy ones can be left in the ground over winter but the tender sorts can be grown in pots in the N. Flowers mostly yellow, slooming in the spring.

(Blanket Flower). Annuals, biennials and perennials native of America. They are favorite cut flowers, doing best in full unshine and a light, open, well drained oil. The hardy annuals grow 2-ft and are onsidered the best cut flowers. They all nake excellent displays in the border.

-Portola Hybrids.

GAIL-7. Pkt. 10c

—cirrhosa. FRIT-2. Pkt. 25c Flowers 1-2-in., greenish, drooping bell-shaped flowers.

-melougria alba major. FRIT-13.

-Mixed Colors. FRIT-7. Pkt. 25c

GAGEA (GAY-jee-ah)

GAILLARDIA

Very large flowers in a wide color range; an excellent strain.

-Yellow Queen. GAIL-4. Pkt. 15c Pure golden yellow, large, very pretty.

GERANIUM (jee-RAY-ni-um)

The Geranium of the florist and the common house plants are listed under Pelargonium; here under this list are the true Geraniums, mostly hardy plants. They have mostly lobed or divided leaves and showy flowers of many colors, usually under ½-inch but sometimes as large as 1½-inches. They are excellent for the border and the rockery and do well in any good soil; some are well adapted for naturalizing.

GERN-6. Pkt. 50c -anemonaefolium. foliage, tall, rose-pink handsome foliage for mild climate GERN-5. Pkt. 25c

A fine border plant, robust grower with dark red flowers, 1½ ft., HP.

GERN-4. Pkt. 50c A very variable species that in its best forms is almost equal to the incomparable G. farreri. Leaves are small, deeply cut, and borne singly on stalks 3-4 in. long; flowers should be about 1 inch across and may be purple or even crimson; early in sunny rock garden and well worth

-grevilleanum. GERN-1. Pkt. 25c A creeping plant with kidney-shaped leaves, hairy and deeply cut; flowers as much as 2 inches across, pale rose, some-times with large purple spots.

-napalense. GERN-2. Pkt. 25c
A straggling plant found on banks and bearing small pink flowers.

-pratense. GERN-7. Pkt. 15c A very hardy form of the wild English Cranesbill, large pure white flowers and a good border plant, 2 ft., HP.

-sanguineum. GERN-3. Pkt. 15c
Rounded plant 8 inches tall, 5-7 lobed leaves and reddish purple flowers.

GERARDIA

GERA-1. Pkt. 25c -virginica. The anthers are very interesting and typical of the genus for automatically dumping the pollen onto the back of the bee. Desirable for cut flowers and garden, flowers 2" across, nice yellow, in rich soil will reach 6 ft.

GERBERA (GER-be-ra)

Tender perennial needing winter protection; the flowers are very popular for cutting and are extensively grown by florists. Start seeds in a warm place such as a sunny window, sowing seeds singly with points up just above the soil; in setting plants out keep crown just above the surface of the soil. Sunny location, well drained soil best; also makes fine pot plants for winter; 1½-ft.

GERB-3. Pkt. \$1.00 These should be ordered early, delivery between Feb.-May; seeds from the best double Gerbera collection in the world, 70% coming double. Pkt. contains 20 seeds.

-jamesoni Hybrids. GERB-1. Pkt. 25c About 25 seeds in packet.

-Giant Hybrids, Si: gle. Hybrids from India. Should be planted

GEUM (GEE-um)

Fasy to grow perennials, erect and generally dwarf, excellent for cutting and adapted for rock gardens, borders or beds. Bloom freely from May to Oct. Plants thrive best in light rich well drained soil in open sunny locations. Sow seeds in the open ground early in spring, 18-in.

-chiloense, Fire Ball, GEUM-1, Pkt. 15c - Gold Ball. GEUM-2. Pkt. 15c - Mrs. Bradshaw. GEUM-3, Pkt, 15c

-Lady Stratheden. GEUM-4. Pkt. 15c

-coccineum. GEUM-5. Pkt. 15c Similar foliage, flowers bright red, 1-in.

-- -Lady Stratheden. Rich golden yellow flowers, double, HP

GEUM-8. Pkt. 40c -elatum A rock garden or border species from the Himalayas with enormous golden, or rarely white, flowers on stems of 6 inches to 2 ft. A woodland plant and best in light shade, HP.

GEUM-6. Pkt. 15c -montanum. flowers, 11/2-in. across

GEUM-9. Pkt. 75c -ulbanum. -Waight's Brilliant. GEUM-10. Pkt. 25c

-Mixed. GEUM-7X. Pkt. 15c; 2 for 25c

GILIA (JIL-i-ah)

Annual, biennfal and perennial plants mostly from W. No. Amer. of Polenonium Family. Easily grown in ordinary garden soil. sowing seed where they are to grow

- achilleaefolia. GIL-2. Pkt. 10c Bushy hardy annual to 2-ft., finely di-vided leaves and dense clusters of blue or purple flowers. GIL-7. Pkt. 50c

-aggregata. For rock garden and border, bright orange, scarlet or red flowers, sun, best in light gritty poor soils, 8-15". HP.

-capitata. GIL-3. Pkt. 10a (Queen Ann's Thimble). Summer bloom ing, hardy annual to 2-ft. with dense roundish heads of light blue flowers blooms continuously. GIL-3. Pkt. 10c

-micrantha. GIL-5. Pkr. 15c: 1/4 oz. 35c (Fairy Stars). Pastel shades of tiny single star-like flowers or neat 6-in. plants, hardy annual, excellent for rock gardens, ground covering or cutting for miniature bouquets. Salmon, pink, copper, yellow and cream. Star-like flowers on neat 6 inch plants, bardy, prepaired. hardy perennial.

GIL-4. Pkt. 15c This is sometimes listed as G. coronop

(Tree or Standing Cypress—Ipomopis Ele gans). Finely dissected leaves and a narrow panicle of scarlet flowers with orange or yellow markings, half hardy biennial best grown as annual, 6-ft.

GIL-6'1. Pkt. 25c White and violet flowers with yellow throat; a neat annual, HA, 9 inches.

-tricolor, Choice Mixed. GIL-6. Pkt. 10c; 1/4 oz. 25c

Hardy annual with lilac flowers spot-ted yellow and purple in center; fine bloomer, 1-ft.

GLADIOLUS (glad-i-OH-lus)

A genus of tender cormous plants native of So. Africa and too common in the U.S. for an extended description. Growing

them from seed is of special interest and much pleasure as well. The seed should be sown in rows in flats and placed in a cold frame until they have germinated and made some root growth; or better still, sow the seed in rows in a protected bed, where they can grow till fall, undisturbed. The corms must be duy before freezing weather and stored indoors over the winter.

-Unnamed Species, GLAD.-3. Pkt. \$1.00 An unnamed species from South Rhodesia, palish yellow in color; the Royal Botanic Garden at Kew is growing this from seed with a view of naming it. It is recommended as distinctly worth growing. Only small amount of seed available.

GLAD-5, Pkt. 25c -blandus. -psittacwus. GLAD.-4. Pkt. 50c A wild species from South Rhodesia and collected from the brightest red flowers. This should be of special interest.

-Wonder Hybrids. GLAD-1. Pkt. 50c This is an English grown strain, which will produce flowers the first season from

-triatis. GLAD-2. Pkt. 50c Large very sweetly scented flowers of yellowish white with a flust of purple at center; fairly hardy but in the North should grown as a pot plant; valuable, possi-for breeding fragrance into Glads,

GLAUCIUM (GLAU-si-um)

Members of the Poppy Family usually grown as annuals altho they are biennial and perennials; sunny situations where their large yellow, orange or red flowers with their bluish dissected leaves give a brilliant effect in the garden thruout the season.

GLAU-1. Pkt. 10c (Horned Poppy). Hardy perennial, flowers scarlet and yellow, makes fine showing in the border, 2-ft.

GLEDITSIA (gle-DIT-si-ah)

Honey Locust. Shade and lawn trees Soak seeds in hot water before planting

GLED-1. Pkt. 35c Honey or Sweet Locust. This species is also used as stock for grafting choice specimens on.

GLOBULARIA

(glob-eu-LAY-ri-ah)

Little shrubby plants from the mountains of S. Europe and Asia, having blue and white flowers in rounded heads and grown in the rock garden; give a well drained soil in a moist and partly shaded location. Easily grown from seed.

—tricosantha. GLOB-1. Pkt. 25c Globe Daisy. A neat little plant with small toothed leaves and small heads of peale blue fluffy flowers on leafy stems, HP, 8 inches.

GLORIOSA (gloh-ri-OH-sah)

Glory-illy. Climbing herbaceous plants active to tropican Africa and Asia, belonging to Lily Family. They grow long tubers and make attractive summer flowering limbers under glass, and growing in the bouth outdoors and in the North can be est outdoors. Tubers are started indoors in pots doing best in a rough turfy loam with leaf mold, with liberal feeding when growth is under way. Easily grown from seeds sown when fresh and available thrust the year.

Spider-lily. Fresh seed available about irst of Feb., March and June. Orange and

GLOR-2. Pkt. 50c -rothschildiana. A rather rare variety with crimson flow-rs with oblong strongly reflexed segments argined yellow and broading to a yel-w base. Fresh seed available as in

GODETIA (goh-DEE-shi-ah)

Attractive hardy annuals, bushy plants with masses of large pink, red and white showy flowers, for beds in sun or semishade, bouquets (all buds open in water). Firive best in cool moist half shady situations, sow seeds broadcast late in the all and allow to remain undisturbed when hey will germinate quickly in the spring as the soil warms and then bloom prousely in late spring; they do not tolerate very hot sun.

GRANDIFLCRA: 1-ft. known in many orms and very popular.

Cherry Red. GODT-10.
A tall double variety, HA, 2ft. GODT-10. Pkt. 25c

-Dwarf Single, Sybil Sherwood. GODT-1. Pkt. 15c

-Dwarf Single Mixed. GODT-2. Pkt. 10c; 1/2 oz. 50c Dwarf Double, Sybil Sherwood.

GODT-3. Pkt. 15c Salmon pink, lighter shaded edges, 15-in all.

-Rich Pink. tuble and an excellent cutting variety 2 ft. GODT-8. Pkt. 25c

Tall Double, Mixed. GODT-4. Pkt. 10c Schamini, fl. pl. GODT-9. Pkt. 25c A charming double variety with large bright salmon-rose flowers, HA, 2 ft. WHITNEYI:

-azaleenschau. GODT-7. Pkt. 20c A beautiful new variety from Germany and most highly recommended, 2 ft.

grandiflora Mixed. GODT-4T Pkt. 25c

Tall double varieties in best mixture palish grown, HA, 2 ft. -Whiteyi, Maidens Blush. GODT-5. Pkt. 15c

Annual, azalea-like flowers in pink suf-used with salmon.

Orange Glory. GODT-12. Pkt. 25c A fiery orange-cerise color, HA, 1 ft.

-Rosemund. GODT-13, Pkt. 25c Dwarf compact variety with large glossy right pink flowers, HA, 1 ft. GODT-14. Pkt. 25c -White Swan. Masses of very large pure white flowers, 1, 1 ft.

-Dwarf Varieties Mixed. Pkt. 25c Including the best named varieties.

- Prize Mixture. GODT-6. Pkt. 15c: 1/4 oz. 80c

An extra special mixture.

GOMPHRENA (gom-FREE-nah)

Useful for bedding and cut flowers as well as for "everlastings". Start seed indoors as it does not germinate well in the open ground, remove the cottony coating before planting. Annual, clover-like blossoms; for drying, do not pick the flowers

— White. GYP-14. Pkt. 15c An excellent perennial species, trailing dense carpet-like plant for rockeries, edging or border, rose color, Iune-july, HP, 6-in. tall.

— White. GYP-15. Pkt. 15c

until well matured, project from rats as they like the seeds.

-rubra. GOMP-1. Pkt. 10c; ½ os. 35c Purple flowers.

GOMP-2. Pkt. 15c A dwarf form with wine-red flowers.

-Mixed. GOMP-3X. Pkt. 10c; ox. 70c June-Aug., 2-ft., white, purple, wine-red, prange and pink.

GOURDS

Should be planted where they are to remain and not until the soil is thoroughly warm both nite and day; the best location is a warm sandy soil somewhat on the dry side. Do not water much after the flowers appear, if watered too much blossoms and buds will drop. For perfect specimens the vines should be trained on a fence. Fruits must be well ripened, when stem becomes brown and hard and fingernail cannot dent the shell; after picking, hang up in a dry airy place to thoroughly cure. The large shelled sorts are then washed and scrubbed before decorating and the small shelled sort just wiped clean of dust and given a light coating of shellad or varnish. There are so many different ways to use these ornamental fruits and they are so decorative during the winter that every garden should grow some. We have made up several blends to meet different demands, select the one meeting your...

SMALL FRUITED VARIETIES.

(Cucurbita pepo). Egg, White. GORD-2. Pkt. 10c GORD-3. Pkt. 10c

Flat. Striped.

Dark green, yellow striped. -Miniature. GORD-4. Pkt. 10c Fruits round, dark green and yellow striped.

Orange. GORD-5. Pkt. 10c -Pear-shaped bicolor. GORD-6. Pkt. 10c reen and yellow.

Pear-shaped, white. GORD-8. Pkt. 10c Pear-shaped, striped. GORD-7. Pkt. 10c Dark green marked with longitudinal whitish bands.

-Spoon. GORD-9. Pkt. 10c -verrucosa, Warty. GORD-10. Pkt. 15c Small green warty fruits.

-Small Fruited Mixed. GORD-11X. Pkt. 10c; ox. 25c; 4 ox. 90c LARGE FRUITED VARIETIES:

(Cucurbita leucantha).

GORD-12, Pkt. 10c -Bottle. -Dipper. GORD-13. Pkt. 10c -Herculus Club. GORD-14. Pkt. 10c Large-Fruited, Mixed. GORD-15X.

Pkt. 10c; oz. 25c; 4 oz. 90c GUNNERA (gun-NEE-ra)

Herbaceous plants with leaves somewhat suggesting those of Rhubarb often enormous in size and highly ornamental. They like rich moist soil, sun, sheltered from high winds. Some species are fully hardy in the North but a heavy winter mulch of leaves is advisable; magnificent plants for subtropical effect.

GUNN-1. Pkt. 250 -species, Mixed.

GYPSOPHILA

(Baby's Breath). Both hardy annuals and perennials, their tiny flowers have an airy appearance; thriving in any soil and location, blooming in July to Aug. Sow seeds early in the open ground for the annual sorts, and for the perennials, plants can be started as late as Aug. so as to get size enough to winter over. They make excellent cut flowers and some make the best dried flowers.

ELEGANS: Annual type, dainty small bell-shaped flowers for mixing in bouquets; blooms within 6 weeks from sowing. Sow as soon as soil is read in spring, and for cutting, plant every 10 days or so.

-Carmine. GYP-1. Pkt. 10c; ½ oz. 40c -Crimson, GYP-2. Pkt. 10c; 1/2 ox. 40c -Rosea. GYP-3. Pkt. 10c; ½ ox. 40c -Mixed. GYP-4X. Pkt. 10c; 1/2 oz. 40c

New York Market. GYP-5, Pkt. 10c; oz. 35c; 4 oz. 95c Pure white, largest flowered, with special emphasis placed on large and extra petaled flowers. Special strain for cut flower growers.

Covent Garden Market. Pkt. 10c; oz. 35c; 4 oz. 95c Greatly improved strain, unusually larg lowers of fine substance. Excellent flori-

(Mongolian Gypsophila). Hardy perennial, rosy white flowers, tall.

GYP-8. Pkt. 10c Hardy annual,, 1-ft. rose colored flowers, litary and auxiliary, dwarf, good rock garden subject.

GYP-9. Pkt. 15c -oldhamiana. Bright flesh pink flowers, mid-summer till frost, 3-ft., perennial.

Hardy perennial, good cutting and much oranched plant of the G. paniculata type out later, more erect, clear rose pink, 3-ft. -paniculata, double, Snowflake.

GYP-11. Pkt. 20c; 1/8 oz. 60c Hardy perennial with tiny round flowers prering the plant. July to frost; excellent or use in cut flowers and a very popular ower, 3-ft.

- Snowstorm. GYP-12. Pkt. 20c; Hardy perennial with flowers like tiny balls, covering the plant; flowers smaller than G. elegans, blooming all summer and fall and making the best of white cut flowers, making any bouquet much prettier with its misty effect; 3-ft.

- Single White. GYP-13. Pkt. 10c;

Hardy perennial with tiny mist-like white flowers in profusion, June-July: nothing better for inixing in bouquets for its misty effect; it is also an excellent everlasting, the whole plant can be hung up in an airy place and dried for winter use, 2½-ft. GYP-14. Pkt. 15c -repens, Rose.

GYP-15. Pkt. 15c

Perennial, with white flowers otherwise ame as above, HP, 6 inches.

HABRANTHUS (ha-BRAN-thus)

So. Am. bulbs closely related to Amaryllis and often classed as Hippeastrum. Have very showy trumpet-shaped flowers in red or yellow over strap-shaped basal leaves. Many species grow in very sandy soil and endure complete drought for months or even years. A few are a little hardy but all should receive Amaryllis culture.

—brachyandrus. HABR-1. Pkt. 25c
Exteremely beautiful Amaryllid, long tubular flowers in an unusual lavender-pink shading down to deep purple at base. Culture same as for Zephyranthes.

HABR-1, Pkt. 25c Probably a variety of H. aulicum with broadly strap-shaped bright green leaves and a pair of large brilliant crimson flowers with red-purple blotch and green throat, 12-15".

-robustus, Finest Mixed.

HAEMANTHUS (hee-MAN-thus)

Blood Lily. African bulbous plants of Amaryllis Family with white or red lily-like flowers. Grown indoors in N. for spring and summer bloom.

-coccinea. HAEM-1. Seets 10c each Unique and unusual, the flower scape is attractively mottled with purple and the flower is blood-red follower. green berries, turning red upon ripen-g. Soil should be rich loam with least

-puniceus. HAEM-2. Seeds 10c each A lovely subject for pot culture, the flowers are about 3" in diameter, salmon color and on 12" stems. Lasts several weeks and is of easy culture.

HEDYCHIUM (hee-DIK-i-um)

(Ginger Lily, Butterfly Lily, Garland Flower). Tropical plants of the Ginger Family mostly native of India. In frostless regions they are favorites in the open garden but greenhouse plants in N. Robust growers, 3-5-ft., with very ornamental foliage similar to that of the Canna, with sprays of spikes of fragrant flowers in white, cream, orange and pinks to scarlet. Rich soil a peaty loam with sand, and good proportion of rotted cow manure.

One inch spikes of bright crimson

—var. augustifolium. HEDY-9. Pkt. 25c Leaves are shorter and broader than those of H. coccineum, spike is denser and shorter, with salmon-pink or brick-red flowers with a larger lip.

HEDY-4. Pkt. 25c -densiflorum. Spikes of white flowers gardnerianum. HEDY-10. Pkt. 25c Flowers in large cluster, dark yellow with orange markings, very pretty, 3-5 ft.

Flowers small greenish white. HEDY-7. Pkt. 25c spicatum.

Spikes 1-ft. long, flowers white HEDY-5. Pkt. 25c

-thrysiflorum. HEDY-6. Pkt. 25c HEDY-8X. Pkt. 20c

HEDYSARUM (hee-DIS-ah-rum)

Perennial plants and shrubs belonging to the Pea Family, native of temperate regions of the northern hemisphere. Fine border plants, easily grown in light soil and a sunny location.

HEDS-1. Pkt. 40c -coronarium. (French Honeysuckle). Beautiful flowers, HB*, 3 ft.

HELENIUM (he-LEE-ni-um)

Mostly perennial plants with yellow flower heads, borne alone or in flat-topped clusters. Rich loamy soil best, and they nake fine background planting in the bor der. Easily grown from seeds.

Two inch heads of flowers whose rays hade from lemon yellow to deep red, to

HELIANTHEMUM

(hee-li-AN-the mum)

Sun-rose. N. American and Med. perennials thriving in dry limestone soils and full sunshine. There are many species all below 2 ft, and used in rock gardens, the border and for ground cover; flowers from July-Sept. Colors yellow, rose, white or purple.

flowers and spreading Bright yellow flow habit, HSh, 6 inches.

HELM-2. Pkt. 25c A very useful dwarf evergreen in many brilliant colors, HSh, 1 ft.

HELIANTHUS (hee-li-AN-thus)

(Sunflower). Annuals and perennials. The flowers range from an inch or two to a foot in diameter, and they vary much in height. They make excellent border plants especially in the back ground, and where birds are sheltered the seed in the flower heads supply quantities of ideal food. Colors vary much altho yellow predominates.

These are the annual Sunflowers, coming a many different forms. They are tender innuals and should be planted direct to transparent and should be planted directly in garden last half of May.

cuc. Starlight. SUN-21. Pkt. 25c Cucumerifolius type with Cactus-like lowers, sulphur-yellow and long twisted etals, HA, 4 ft. -Golden Tufts. SUN-2. Pkt. 10c; ox. 20c

-Sulphur-yellow. SUN-3. Pkt. 10c; Single, large flowers. oz. 20c - Stellata, Mixed. SUN-6. Pkt. 10c;

-Dwarf Double. SUN-7. Pkt. 10c; oz. 20c Height 5-ft., golden yellow, variegated eaves. -Aureole Reinland. SUN-8. Pkt. 15c

oz. 20c

A beautiful new German variety, wine-ted zone and pure yellow ground, flowers varying in colors, they make up extra good for bouquets. Russian. SUN-9. Pkt. 10c; oz. 20c;

Tall single flowered, grown for seed and background display. -Annus, Red. SUN-22. Pkt. 20c An especially selected English strain having chestnut-brown shades, HA, 6 ft.

_Tall Red. SUN-10. Pkt. 10c; oz. 20c; 4 oz. 35c Tall growing, 8-ft., large red flowers.

SUN-11. Pkt. 15c Sturdy well branched plants, 4-5-ft., bearing 3-in. flowers in pastel shades of rose, apricot, coral and red, mid-summer till

-Intermediate Hybrids. SUN-12. Pkt. 15c Intermediate type in many new hybrids; of Swiss origin.

-Italian White. Litalian White.

Cucumerifolius selection with flowers pure or creamy white or rarely soft primrose; brown centers.

— T&M Strain.

SUN-14T. Pkt. 25c.

This is an English grown strain of these fine hybrids, a striking strain in yellow flowers with broad zones of red, HA, 3 ft. Excelsior Hybrids. SUN-14. Pkt. 15c Miniature type, bronze, brown and red shades zoned.

SUN-16, Pkt. 15c -Stella. Miniature type, large flowered, golden yellow with dark centers, 5-ft.

Yellow flowers with twisted petals, 4-6

Sun Gold. SUN-18. Pkt. 10c; oz. 25c Large, densely double, 100%, brilliant tolden yellow flowers like giant Chrysmthemums, 5-ft. tall. They are fine for ouquets.

Perennial Varieties Mixed.

-Mixed Sunflowers. SUN-20X. Pkt. 10c; Contains seed of all types and colors including those listed above and many others.

HELICHRYSUM (hel-i-KRY-sum)

(Strawflower). The main flower used for drying, hardy annual, best in a rich loamy soil, start seeds indoors for early flowers or plant directly in garden early in spring; flowers are shiny, stiff, 2-2½-in. in white, yellow. orange, red, pink and lavender Can be used for cut flowers or for drying. The flowers should be cut when partly open, dried slowly in a cool shady place, heads downward; we offer an improved strain, 2½-ft, tall.

H. Bracteatum monstresum: The most

H. Bracteatum monstrosum: The most copular type, large flowers, fully double and showing no yellow disk flowers in the

-Crimson. HELI-1. Pkt. 10c; 1/2 oz. 90c -Fireball. HELI-2. Pkt. 10c: 1/2 oz. 90c -Golden Globe. HELI-3. Pkt. 10c;

1/2 oz. 90c

-Violet. HELI-4. Pkt. 10c; ½ oz. 90c -Yellow. HELI-5. Pkt. 10c; ½ oz. 90c Formula Mixture. HELI-6X. Pkt. 10c: Hand made blend in the proper color reportions, not a cheap mixture of the unallable colors.

Tom Thumb Mixed. HELI-7. Pkt. 10c: Dwarf, double flowers, these are especially good for bedding or edging.

HELIOPSIS (hee-li-OP-sis)

Hardy perennials with yellow Sunflower-ike heads 2½ inches across and plants -ft. tall. Seeds sown outdoors even in dry oil and open, exposed locations will pro-luce flowers the second year; they are good cut flowers.

-scabra major.
Golden yellow flowers. HELO-1, Pkt. 10c

——incomparabilis. HELO-2. Pkt. 35c Semi-double orange flowers strain, HP, 3 ft.

HELIOTROPE

-Marina.

Half hardy and greenhouse plants, which, because of their pleasant fragrance and attractive flower clusters of blue and purple shades, have long been a garden favorite. Will grow in sun or shade, easily grown in any good soil, summer plants can be potted for winter use. Start seeds indoors early and set out only when all danger of frost is over.

Souvenir. HTOP-1. Pkt. 20c Bishop's violet, large flowered

HTOP-2. Pkt. 20c

Lavender-blue variety, Lemoine's Giant -Valencia. HTOP-3. P
Rosy bishops-violet. Lemoine's strain.

Olympia.

Dark violet-blue, French. HTOP-4. Pkt. 20e

-King of the Blacks. HTOP-5. Pkt. 20c HELIPTERUM (hee-LIP-ter-um)

Grown mainly for winter bouquets or everlasting; it is one of the daintiest in the annual group of flowers and easily grown from seed, which are generally sown outdoors early in the spring when the soil is in condition or they can be started indoors for earlier flowers. Plants 1-2-ft. tall, and space plants 6-12-in. apart in the row.

-sanfordi. HLIP-1. Pkt. 10c; 1/2 oz. 40c (Humboldtianum). Small flowers in clusters making balls 1½-in. across, color deep rich golden yellow with the outer bracts having a greenish tinge; cut when buds are open, strip off the leaves and hang in a shady place for drying, they retain their color for years.

HELLEBORUS (HEL-ee-bor-us)

Perennial fibrous-rooted plants, hardy and bloom in earliest spring and even mid-winter. Seeds are slow to germinate, 6-8 months.

orientalis, Mixed Shades. HELLE-6. The Lenten Rose which flowers Pkt. 60c pring and similar to the Christmas Rot ut with flowers of various shades ink, red, brown and often mottled; ver andsome.

-Deep Shades. HELLE-3. Pkt. 75c Pink and Whites. HELLE-4, Pkt. 50c

foetidus, var. Olympicus. HELLE-5. The flowers are green, sometimes bordered with bright purple; blooms in late winter or early spring, 1 ft., HP.

niger, Hybrids. HELLE-1, Pkt. 25c miger, Hybrids. HELLE-1. Pkt. 25c (Christmas Rose). Bright colored divided foliage and large attractive rosy white flowers resembling wild roses or anemones with prominent yellowish stamens, appearing in late winter or early spring; partial shade, in rich moist soil and do not disturb when once established; a fern bed gives excellent protection both winter and summer. They are excellent for the border or for the rockery, and plants potted up in late summer can be flowered in-

HFMEROCALLIS

(hem-er-oh-KAL-is)

A genus of mostly tuberous-rooted peremials called Day lily. The growing of them from seeds is a very interesting pastime much as is the case with Dahlias, etc. The new colors and forms resulting are of interest to the flower gardener.

—Indian Hybrids. HEME-2. Pkt. 50c
This is one of the finest strains of Day
Lilies to be had. Seed saved from the
finest collection of named varieties in rich
mixture of colors in yellow, cream, orange,
golden, bronze, copper, crimson, pink,
carmine, etc. Ready for delivery between
July and Oct. Plant fresh seed and order
now,

HEME-1, Pkt. 25c Golden Daylily). Very hardy, perennial, easily grown from seeds, blooming freely in one year; thrives in full sun but tolerant to some shade; sow seeds very early in spring or very late in the fall; color range in this large flowered strain includes buff, lemon, orange, copper, red to maroon and somess.

HERACLEUM

(her-ah-KLEE-um)

Herbaceous perennials used for bold effect bearing enormous umbels of minute white or pink-tinted flowers.

-mantegazzianum. HERA-1. Pkt. 20c A stately plant for background, 8-ft. Fine for specimen plants.

HESPERANTHA

(hes-per-AN-thah)

Tender bulbous plants from S. Af., somewhat similar to Ixia, opening in the evening; the star-shaped flowers are fragrant; like sun, sandy loam and peat and must be treated as pot plants in the N.

HSPR-I. Pkt. 75c The bright rese-red flowers are borne in loose spike to 2 ft. in length and have ellow anthers, some white flowers; tender.

HERMODACTYLIS

(her-mon-DAK-ti-lus)

Very closely related to Iris; they are quite easy and hardy; grow in light soil in sun, in cold climates it may be advisable to winter in cold frame.

—tuberosa. HERM-1. Pkt. 50c
Widow or Mourning Iris. The outer segments of the flower are nearly black, the
inner ones green, a very peculiar and
attractive plant, easily grown from seed,
1-1½ ft., HP.

HESPERIS (HES-per-is)

Hardy biennials and perennials of erect branching habit that bear white, rose or mauve-purple flowers in pyramidal spikes; excellent cut flowers, June-Aug. They are 1-3-ft. tall and their colorful display is enhanced by their sweet fragrance, give a sunny position in the border. S seeds outdoors in April or indoors March, flowering the following seasons

-Matronglis, Violet. HESP-1. Pkt. 10c; (Sweet Rocket). Best grown as a biennia

-- White. HESP-2. Pkt. 10c; ½ oz. 25c

HETEROPAPPUS

(het-e-ro-PAP-pus)

Hardy border plants with azure-blue aster-like flowers in summer; somewhat similar to Boltonia. AST-66. Pkt. 20c

— —Blaugritli.

HEUCHERA (HEU-ker-ah)

Herbaceous perennials usually dwarf, compact habit of growth; June-Sept., and valuable in low border or rockery; good loamy soil, sunny position, will produce mats of deep green, sometimes tinged with white or red from which rise slender stalks bearing airy clusters of bell-shaped flowers, excellent for cutting; plant seed early in the spring. Seed germinates best warm and in light.

HEU-1. Pkt. 20c Western native species.

—maxima hybrida. HEU-2. Pkt. 40c Large flowers on stiff stems in white, deep rose and bright red. HEU-2. Pkt. 40c

SANGUINEA: (Coral Bells). Bell-shaped flowers, 1/2-in. long with prominent coral colored calyx, colors pink, rose and red, stems 12-18-in., July-Aug. HP, 11/2-ft.

-Spittire. HEU-3. Pkt. 20c
Large rich scarlet flowers, very pretty. -splendens. HEU-4. Pkt. 20c Vermillion colored flowers.

HEU-5. Pkt. 20c Many different colored hybrids.

HIBISCUS (hy-BIS-kus)

Mallows flower in the late summer when other flowers are scarce, they like sunny positions, are quite hardy. The herbaceous group will bloom first season if started indoors very easly; the genus is very large and variable. The annual kinds are very easily grown from seeds.

Avalon Hybrids. HIBS-1. Pkt. 20c Militaris crossed on Coccinus producing wonderful color variations, finest of all and different in every way; very hardy color range from palest blush thru many tones of pink, then rose to reds, colors never before seen in Hibiscus; eyes are not common but are oddly rotated in deeper colors, long blooming season.

-homabo. HIBS-8. Pkt. 50c -militaris.

HIBS-2. Pkt. 15c Very hardy and rugged, making a good herbaceous hedge, sown in position; flowers bell-shaped of soft pink with rose strictions, easily grown, 4-ft.

-moscheutos, Hybrid., HIBS-3, Pkt. 15c (Giant-Mallow Marvels): Very satisfactory perennials easily grown from seed and make a dandy addition to the hardy border. These hybrids have a fine color range from palest blush thru pure pink to rose with snowy white and pure crimson; center eyes common, 4-ft.

HIB-4. Pkt. 30c Ouick growing, long blooming annual with multitudes of big ivory-toned cupblossoms centered with golden tassels, the petals patched violet at the bases; a very pleasing addition to the flower border, HHA, 2½-ft.

HIERACIUM (hy-er-AY-shi-um)

Perennial composite plants with red orange or yellow flowers, some of which are called Hawkweed. They are easily grown from seed; those listed are all attractive and useful border or rock garden plants. The leaves are in rosettes with the flowers in heads on erect stalks.

—villosum. HIER-1. Pkt. 25c A showy rock plant with yellow flowers and silvery leaves, HP, 1 ft.

HOLLYHOCKS (Althaea rosea)

These are all perennial, except Indian Spring, and do their best in deep, rich well drained soil and like a warm sunny situation sheltered from wind. Group plantings not too large make attractive situation shelfered from white Gro-plantings, not too large, make attractive color in the background plantings. Pla seed early, either indoors or out. We li-only the very best strains.

ANNUAL VARIETIES:

-semi-double, Mixed. HOLY-1. Pkt. 10c; ½ oz. 45c -Single, Finest Mixed. HOLY-2 Pkt. 10c; 1/2 oz. 45c

HOLY-3. Pkt. 10c; -Indian Spring. 1/2 OZ. 450 Free flowering annual, semi-double rose and pink shades, 5-ft. tall.

PERENNIAL VARIETIES:

-Allegheny, Mixed. HOLY-4, Pkt. 10c: Semi-double flowers, 5-in. across.

Begonia-Flowered. HOLY-15. Pkt. 15c Large flowered, wide petals with pretty aised centers, very showy.

HOLY-5. Pkt. 15c Beautiful fringed flowers in pink to erise salmon, 5-ft. Triumph, Double Mixed. HOLY-6.

Flowers are waved and fringed with a distinct branching habit unlike the tall Hollyhocks, these will make good showy displays in small groups as bush specimens, give 2-ft. space between plants, 5-10 in a group, 3-4-ft.

CHATER'S DOUBLE HOLLYHOCKS:

These grow about 6-ft high and make very pretty displays in the border when planted in one variety for a bright showing. We offer one of the very best strains of these beautiful flowers.

-Colorado Sunset. HOLY-7. Pkt. 15c A buff apricot and extremely attractive

Red Emperor. HOLY-8. Pkt. 15c -Scarlet. HOLY-9. Pkt. 15c -White. HOLY-10. Pkt. 15c -Yellow. HOLY-11. Pkt. 15c -Empress Strain. HOLY-12. Pkt. 15c;

1/2 oz. \$1.00 A Holland grown strain in mixed varieties of Chater's doubles.

-Chater Blend. HOLY-13X. Pkt. 15c ½ oz. \$1.00 A hand made blend of above varieties a well balanced color combination.

—Hollyhack Mixture. HOLY-14X.

Pkt. 10c: ox. 80c

Contains double, semi-double and single varieties, including every type.

HORDEUM (HOR-de-um)

Ornamental grasses, both annual and

—jubatum. HORD-1. Pkt. 10c (Squirrel-tail, Grass). Hardy annual, heads 4-in. long, nodding, with beards 3-in. long, use as an ornamental grass and if cut just after the spikes emerge from the sheath and dried, they make excellent winter bouquets, 2-2½-ft.

HOSTA (HOH-stah)

Plantian-lily. Funkia, Day-lily. Perentials with thick durable roots belonging to the Lily Family, native of China and apan. They are widely planted for their foliage effect, the large glossy leaves making excellent accents at corners of beds, etc. They require a rich soil, do well in sun and some in shade. The clowers are in white or blue, funnelshaped in loose clusters or racemes. They make fine hedges along a drive.

sieboldiana. HOST-1. Pkt. 25c Cream flowers tinged with blue and glaucous foliage, HP, 1½ ft.

HUMULUS (HEU-meu-lus)

Twining vines (Mulberry Family) grown

—japonicus. owing annual vine 10-20 ft. from May planted seed.

— variegatus. HOP-2. Pkt. 15c.

The green leaves are streaked and blotched white and are very decorative seedling show considerable and interesting variations.

HUNNEMANNIA

(hun-e-MAN-i-ah)

(Mexican Tulip Poppy). Hardy perennial, doing best in sun, well drained sandy soil, survives drouth. Flowers yellow, tulipshaped, 3-in. across and fine for cutting, if cut just before fully open, they will last a week. Treat as an annual sowing seeds early to have flowers the first season, 20-inches.

-fumarialfolia. HUNN-1. Pkt. 10c -Sunlite. HUNN-2. Pkt. 15c

Improved type, semi-double canary yel-ow flowers; the extra row of short petals in the outside instead of the inside, very

HYACINTHUS (hy-a-CIN-thus)

Related to the familiar garden hyacinths are a number of smaller species, very attractive for the rock garden or front border; closely allied to Grape Hyacinths, Muscari and the names are often confused; all hardy and easily grown from seed, altho time is required to reach flowering size.

—azureus. HYAC-1. Pkt. 50c This is the true species, which is diffi-cult to find; above the several narrow basal leaves rises a short stem bearing 20-40 nodding bell-shaped flowers in Cam-bridge-blue, 6 in., HP.

HYDRANGEA (hy-DRAN-je-ah)

Deciduous shrubs belonging to the Saxifrage Family and valued as ornamental
plants they have large clusters of showy
white, pink or blue flowers. They thrive
best in a rich moist soil and flower freely

A moderate sized shrub with large dull green leaves; flat heads of flowers 6 in across, a very handsome plant, hardy in mild climates and a fine pot plant in the N., 6 ft.

HYDROPHYLLUM

(hy-droh-FIL-um)

Water-leaf. Hardy American, mostly perennials, useful for the wild garden or tich shady places. Some are very good for planting in the shrubbery.

eapitatum. HYDO-1. Pkt. 25c

HYMENANTHERA

hy-men-AN-the-ra)

Shrubs or small trees of Violet Family with small flowers followed by ornamental betries which last for a long time; no very hardy, grow in a warm sheltered

I. YM-1. Pkt. 50c crassifolia. ...IM-1. FKt. 3w. Low shrub from New Zealand with many stiff branches covered with white furrowed bark and thick leathery leaves; white and black berries, very showy, 2-4 ft., HP.

HYOSCYAMUS

(hy-oh-SY-ah-mus)

Funnel-shaped flowers in spikes called Henbane, found on poor soil. Some spe-cies are grown for medicinal uses.

HYOS-1, Pkt. 10c -niger.

HYPERICUM (hy-PER-i-kum)

St. John's Wort. Perennial plants and shrubs, very decorative, usually with bright yellow flowers with many showy stamens. They grow easily in loamy or sandy soil, best in a semi-shady position; useful in the rock garden or the border. Most are not real hardy in the N. and if sheltered places, with winter protection, they can be grown even in Michigan. They are pretty plants.

HYPR-2. Pkt. 25c -patulum. 3 foot shrub with large solitary or clustered flowers.

IBERIS (y-BEE-ris)

CANDYTUFT. Small to medium sized annual and perennial herbaceous plants, native of S. Europe, hardy and easy to grow. There are two distinct kinds, the half hardy annuals and the perennials. The annuals are used in the rock garden and for edging or in pots, and will bloom the entire season if kept from seeding. The perennials bloom only in the spring. Both are low growing, do well in ordinary garden soil and require little care. Sow seeds of the annuals outdoors in mid-May as they do not take to transplanting. The larger the planting the better the effect. Germination is fast and growth rapid. The perennials can be sown in the fall.

Gibraltar Candytust). Evergreen perennial with light purple or lilac flowers in

Dwarf, 4-in. tall, perennial, pink flowers. Excellent rock garden plant.

White flowers, 1 ft., HP.

(UMBELLATA: Globe Candytuft). Anual, branching freely, to 15-in. tall. This st he popular garden Candytuft, with nany varieties.

-Giant-Hyacinth-Flowered, White. IBER-5. Pkt. 10c; oz. 50c Empress. IBER-6. Pkt. 10c; 1/2 oz. 50c

Large spikes of the purest white, erect -Hyacinth-Flowered White.

Pkt. 15c; oz. 90c.
Reselected Florist Strain. This is a superior strain, 15-in. tall with enormous trusses of uniform blooms. -Best Mixed. IBER-8. Pkt. 10c;

Umbellata, in all its colors.

ILEX (Y-leks)

Holly. Evergreen and deciduous trees and shrubs having glossy leaves and brilliantly colored berries. Some are tender but they all are very ornamental for the garden or for lawn specimens. Easily grown from seed.

ILEX-1. Pkt. 25c

-insignis. -fragilis.

ILEX-2. Pkt. 25c HOP-1. Pkt. 10c IMPATIENS (im-PAY-shi-enz)

(Touch-Me-Not, Snapweed). Interesting genus of greenhouse, border and wild garden plants, differing so in form and habit that only the spur formed by one of the three sepals and the way the ripe seed pod quickly curl at a touch to expel the ripe seed, reveals their relationship.

ripe seed, reveals their relationship.

BALSAMINA: (Golden Balsam). This is the popular garden Balsam with its rose-shaped flowers in white, lavender, lemon-yellow, and many shades of red crowded closely to the leafy stems. Seeds sown indoors in April and set out in June will continue to bloom till frost when most flowers are gone. Require rich sandy loam, ample moisture, some shade and plenty of room, space 2-ft. apart. Pinch off first buds and remove side shoots if a heavily flowered central spike is wanted; 2-ft. tall.

-Double Camella-Flowered.

Pkt. 15c Finest mixed, a beautiful flowered strain -Double Rose-Flowered. IMP-2.

Pkt. 10c; 1/4 oz. 50c

The double flowers are clustered in the carils of the leaves on short stems giving the plant a rose-like appearance, white, rose and red shades; full sun, rich soil, plenty of moisture, 20-in.

-Double Flesh-Flowered. IMP-13.

Pkt. 35c Bush-flowered, HA, 1 ft. Double Rose. IMP-14. Pkt. 35c Bush-flowered, English grown strain, HA,

HOLSTI: Red-striped stems and flowers carying from white to scarlet; grown as treenhouse plants, house plants and for summer border subjects. Tender perennial. IMP-3. Pkt. 15c

-hybrids.

-Morganrote.
Large flowering, salmon. IMP-5. Pkt. 50c Schottenglut. IMP-6. Pkt. 50c Dark red, an especially fine plant.

SULTANI: Best known greenhouse sub-

cut: plants bear flowers the third year.

—corsicus.

HELLE-2. Pkt. 35c

Winter or early spring flowering with green spotted flowers HP, 11/2 ft.

HERACIUM (hy-er-AY-shi-um)

Decidly valued for showy plants in the background, 7-ft.

His-fix plants bear flowers and or real hardy background in the south during the winter.

HIBS-6X. Pkt. 15c

HYDR-1. Pkt. 50c

HYDR-1. Pkt. 50c

HYDR-2. Pkt. 35c

HYDR-2. Pkt. 35c

HYDR-3. Pkt. 35c

-Karminzwerg. IMP-7. Pkt. 50c
A new dwarf variety in a glistening

IMP-8. Pkt. 20c -Hybrids. IMP-9. Pkt. 20c -arguia. 9-inch plants bearing violet flowers in autumn.

-diffusum. IMP-10. Pkt. 20c Small plant with funnel-like flowers bunches.

-urticifolia. IMP-11. Pkt. 20c Robust, erect plant with large flowers.

INCARVILLEA

(in-kahr-VIL-ee-ah)

China; plants produce terminal clusters of red or yellow flowers above the basal group of vivid green leaves; flowers tubular with a broadly expanded 5-lobed rim. Thrive in rich but light, well drained soil in sunny location. Plant seeds in spring or summer for flowering the following summer; in the N. give winter protection.

-delavayi, A. A. ICAR-1, Pkt. 15c 2-ft. tall, rose-purple flowers with yellow tubes, very fine, late flowering perennial

ICAR-3. Pkt. 25c Has sprays of pretty tubular rose-pini flowers and finely cut foliage, HP, 2½ ft grandiflora brevipes. ICAR-4. Pkt. 25c One of the best for the Rock Garden, arge brilliant crimson-purple gloxinia-like clowers and pretty foliage, 9-12", HP.

ICAR-2. Pkt. 25c An easy to grow annual ever-bloomer, flowers are trumpets reminding one of Gloxinias, blending of cream into pale rose, foliage fern-like, 2-ft.

INDIGOFERA (in-di-GO-fe-rah)

Plants of Pea family, with sprays of comewhat pea-shaped flowers, rather ten-der and requiring greenhouse or window reatment in N.

dosua.
A species from India. INDI-1. Pkt. 25c INDI-2. Pkt. 25c -potanina. A hardy shrub with mauve-purple flow

INULA (IN-yu-ia)

Great daisy-like heads of yellow or or inge on rather tall plants; easy in sunny places in ordinary soil; summer flowering pecies are especially valuable for brilspecies are especially value iant display; all are hardy.

INUL-1. Pkt. 35c One of the finest species with hugerinkled leaves and narrow rayed sun flowers of rich golden yellow, 6 in. across in late summer; fine for border, 2 ft., HP.

IPOMOEA (y-poh-MEE-ah)

(Morning Glories). Easily grown vines in my fairly good soil; never plant until soil so thoroughly warm, if too cold seeds will only rot, even in southern Cal, they should not be planted until late May. Filing a small notch at top of seed helps considerably in germinating; always select the driest, sandiest part of the garden, planting where they are to remain as they essent transplanting. Keep plants on the far side to induce early and abundant clowering and sparse leaf growth; a poor soil is better than a rich one, and no fertilitier; best on wall, fence or trellis, about 3:t. Itall. See Convolvulus for other, so-called Morning Glories.

PURPUREA: This is the common garder Morning Glory which comes in many vari eties as listed below.

-Cornell. IPOM-1. Pkt. 15c; oz. \$1.00 Large flower type, Morning Glory, with cornelian red, bordered white flowers, free colooming, attractive bright green foliage -Heavenly Blue; IPOM-2. Pkt. 15c;

oz. 60c (Clarke's Early Strain). Sky-blue sho ng golden-yellow in throat, very early Pearly Gates. IPOM-3. Pkt. 15c:

oz. \$1.30 Vigorous, free blooming, pure white with faint creamy sheen near center.

Rose Marie. IPOM-4. Pkt. 15c; oz. 70c Only double flowered Ipomoea, deep ose, early flowering. -Scarlet O'Hara. IPOM-5. Pkt. 15c;

Dark wine red, early, attractive foliage, $\sqrt{2}$ -in. flowers. -White Magic.

IPOM-6. Pkt. 15c; Very early and free flowering. Large fleecy white blending to cream deep in throat, making a heavy cascade of flowers over trellis.

Red, White and Blue. IPOM-7X Equal mixture of Scarlet O'Hara, Heaven-y Blue and White Magic, for those wishing a red, white and blue combination.

-Large-flowered Mixed. IPOM-8X. Pkt. 15c; oz. 70c
Blend of the above varieties.

Purple throat shading to lavender, a might flowering favorite in the moonlight IPOM-17. Pkt. 20c Large seeded, wild Morning Glory, native of Texas, HP.

-hederifolia or nil. IPOM-10, Pkt. 20c Ivy leaved strain, rapid growing vines, lowering in 6 weeks from seed. The source of the large flowering Japanese or Imperial orms. Colors blue, purple, pink, or rose.

—striped leaves. IPOM-11. Pkt. 20c Same as above except it being a striped leaf strain, with large flowers. —lindheimeri. IPOM-16. Pkt. 20c
Perennial vine with 1 inch purplish flowers, native of Texas. -lindheimeri.

-Nlimbata, Hybrids. IPOM-12. Pkt. 15c -imperialis, Mixed. IPOM-13. Pkt. 15c; (The Japanese or Imperial Morning Glories). This strain is especially large, with a very good color selection.

-nociflora. IPOM-14. Pkt. 10c; oz. 40c (Moonflower). Black seed. They are now classified as Calonyction aculeatum. Flowers open all night and close at noon, except on cloudy days, growing to 20-feet in good soil. Tender annuals. Soak and notch seed before planting; they can be started in small pots indoors a month earlier. IMP-4. Pkt. 15c

-White Seeded. IPOM-15. Pkt. 10c;

IRIS

These are easily grown from seed, the growing of which is very interesting and entertaining, especially those gardeners who have the experimental urge. The most important point in Iris is that cold instead of warmth is required in their germination; sow seeds outdoors in late fall so they will have the benefit of winter freezing. If planted in the spring use the refrigerating method as explained elsewhere; after the seeds germinate they may be transplanted most any time. Like the growing of Dahlias, Gladiolus and many other such flowers, from seeds, there is plenty of interest in their growing and the developing of new types, colors and combinations.

—Alaska.

IRIS-1. Pkt. 20c

Dwarf blue, gathered on Kodiak Island and most likely I. setosa which is 18-in. all, beautiful, deep purplish-blue flowers.

Pretty bright blue, blotched violet, throat

Clarkei x chrysographes. IRIS-22.

This hybrid between two Asiatic species should produce very striking handsome seedlings, both parents belong to the beardless group with deep violet to red-purple flowers, 2 ft., HP. Mostly deep blue flowers results.

-chrysophylla. IRIS-16. Pkt. 50c

dichotoma. IRIS-2. Pkt. 15c; oz. \$2.00 dichotoma. https://p.fkt. isc; or. \$2.00 (Vesper Iris). Quickest and easiest grower of the Irises, often giving a few glowers the first year from seed; flowers are fragrant, bloom thru Aug., bearing in great sprays, 4-ft. high, color range translucent lavender, creamy white to violet, outple with markings of buff, mahogany and copper.

IRIS-17. Pkt. 50c Perhaps the most popular of the western Iris, varying into many delightful color forms.

-foetidissi_ra. IRIS-30, Pkt. 25c Evergreen foliage, sun and sadde, flowers bluish and variable. The brilliantly colored seeds are valued for drying for winter use.

IRIS-28. Pkt. 25c IRIS-29. Pkt. 25c - aurea. --ochroleuca.

fulva, Mallendu's Variety. IRIS-24. Pkt. 25c An English selection from the rich cop-or colored American species; likes mois-re, 2 ft., HP. -fontanesii. IRIS-25. Pkt. 50c A slender species from Morocco, related closely to the Dutch and Spanish varieties of the florists; flowers are deep blue and are fine for cutting. HHBb., 2 ft.

One of the finest of bulbous Iris with rolden flowers, sweet scented, requiring rood drainage, hot sunny location; tender in N. and best grown there in cold frame; rom Morocco, very scarce and slow to acreese from bulbs. I ft.

IRIS-3. Pkt. 20c The Japanese type, the most magnificent of the entire genus. They require an acid, rich soil and abundant moisture during their growing season. This is a French grown strain.

IRIS-13. Pkt. 20c Same but seed from India. -kerneriana.

A bright yellow beardless species from Anatolia, rare and lovely, responds readily to same treatment as I. sibirica but because of its rarity should be protected till well established. -kumaonensis. IRIS-27. Pkt. 50c

milesii. IRIS-19. Pkt. 50c Like I. tectorum but taller and easier; probably not real hardy in No. -missouriensis. IRIS-15. Pkt. 25c A good species, native of the western states and the only wild species in the Mont. area.

nepalense. IRIS-14. Pkt. 25c IRIS-4. Pkt. 20c

Dwarf growing species belonging to the pearded or Pogoniris group, 6-12-in. tall, elcoming in April, thriving in either alkanne, neutral or acid soil, rich but not too ich a soil. siberica, Mixed. IRIS-5. Pkt. 15c

Contains many color forms and most videly grown of the beardless forms, from which many new hybrids have been de-IRIS-23. Pkt. 50c A grassy leafed species from the Balkans that should be easy in border or beside streams or pool, 1 ft., HP.

-spuria, Mixed. IRIS-6. Pkt. 20c Flowers resemble in form the bulbous Dutch and Spanish Irises. Long lasting when cut; has satiny seeds. Colors include yellow splashed whites, golden yellows, lawnies, lilac, lavender and varied blues.

IRIS-18. Pkt. 50c Easiest and hardiest of the western species, in eastern gardens, and with exceptionally beautiful flowers of varied hue. Very dwarf and suited to the choicest rock gardens, HP.

viscaria. IRIS-22. Pkt. 75c Very rare, blue flowers;

IRIS-24, Pkt. 75c Tall bamboo-like stems and white flats, very rare in seed; a very beautipecies but not real hardy in the N. 2½ -Avalon Blend. IRIS-7. Pkt. 25c; oz. \$2.00

Contains a very large number of species and we believe the best collection obtainable; for one interested in growing Iris rom seed, there is in this blend species hat would be difficult to secure in any there way. -Delta Blend. IRIS-8. Pkt. 20c; oz. \$2.00

(Louisiana Delta Inis-8. Pkt. 20c; oz. \$2.00 (Louisiana Delta Iris). Quite unlike other iris groups and is hardy in the North, even tho it comes from the South; blossoms large standards mostly horizontal, flowers show clearest blue, lavender to purple, red-violet, lilac cerlse with pink-tawny and rose tones, mahogany, near reds and orange with white.

Iris Blend, IRIS-10X. Pkt. 15c; oz. \$1.00 Containing all types and kinds. -Vilmorin Choice Mixed.

A blend made up by a leading French grower, and should contain many different types. Pkt. 15c; px. 60c -wattii.

IRIS.-26 Pkt. 75c -Saier's Blend. IRIS.-10x. Pkt. 25c

ISATIS (Y-sah-tis)

woad. Annual, biennial and perennial plants (Crucifer Family). Erect or branching with small yellow or yellowish flowers. There are two species especially ornamental, both easily grown from seed.

ISAT-1, Pkt. 15c --- glauca. Perennial, used in the border, flowers yellow in very large clusters, to 4 ft. tall.

IXIOLIRION (ik-si-oh-LI-ri-on)

Siberian Blue Bells. Summer blooming bulbous plants with violet or blue lify-like flowers in flat heads. They are tender and bulbs must be lifted and stored indoors over winter.

-montanum.

IXIO-1. Pkt. 50c

JACARANDA (jak-ah-RAN-dah)

Propical American trees or shrubs of Begonia Family. Easily grown from seed and some are used as street trees in the South but in the North only as greenhouse

Sometimes listed as J. mimosifolia. Elegans finely cut fern-like leaves and loose clusters of large blue flowers.

Juniper. Small and medium sized ever-green trees and shrubs and includes many of the finest ornamentals used in landscaping. Most of them are very hardy and they grow well most any where, ex-cept in shade and wet ground; a few are found, however, in marshes.

pseudo sahiana. JUN-1. Pkt. 30c Small tree or shrub to 30 ft. with spread-ing branches, leaves gray or green with whitish band.

JUN-2. Pkt. 30c Erect shrub with thick and short branch lets.

JASMINUM

Tropical or sub-tropical deciduous or evergreen shrubs, some climbers. They can be grown outdoors in the S. but are greenhouse plants in the N. where they are grown for their showy fragrant flowers; a good loamy soil is ideal.

JASM-1. Pkt. 25c A favorite plant in the S. for growing against pillars or fences, producing a vast number of flexible branches with small leaves and 1' long tubular yellow flowers, very fragrant; full sun, to 20 ft., half bordy shrub.

KNIPHOFIA (nip-HOH-fi-ah)

(Torch-lily, Red-hot-Poker, Poker Plant and Flame-flower, also listed as Tritoma). Most striking garden plants for autumn flowers, with their dense cigar-shaped spikes of red or yellow tubular flowers rising like skyrockets above other plants; seed sown very early indoors will produce some flowers the first year. Where the climate is too severe during winter they may be dug up and stored in dry soil over winter; the species hybridize freely.

A vigorous species with broad Yucca-like leaves and dense racemes about 6 in. long comprised of tubular flowers 1½ in. long, blood-red at first, turning golden yellow; one of hardier species and worth trying in the N., 4 ft., HP.

-gracilis. KNIP-2. Pkt. 15c Orange-red flowers. KNIP-4. Pkt. 10c Early hybrids.

KNIP-5. Pkt. 15c -Pfitzer's Hybrids. Very large brilliant red.

-Uvaria Hybrid, gr. fi. KNIP-3. Pkt. 15c Most common grown species, large flowered, mixed, perennial.

-Verricres, Hybrids. KNIP-1. Pkt. 15c whiteand coral red flowers

-Mixed. KNIP-6X. Pkt. 10c: ¼ oz. 80c A mixture of above together with other varieties as received.

LAGURUS (lah-GEU-rus)

(Hares-tail or Rabbit-tail Grass). annual ornamental grass, sometimes grown indoors as a pot plant and also for dry flowers in the winter, can also be used as an edging grass, 6-9-inches.

-ovatus, LAGU-1, Pkt. 15c; 1/4 ox. 25c Clump forming with soft woolly heads up to 2 in. long, 1 ft., HP.

LANTANA (lan-TAH-nah)

Shrubby plants resembling Verbenas to which they are related. They are tropical plants and natives from the Gulf States south and are fine greenhouse plants as well as for the garden. Being tender they must be started easly indoors and protected against cold and frosts. Seeds are slow to germinate.

-Bruant's Dwarf Hybrids.

LANT-1 Pkt. 15c (L. camara). Widely grown in the greenhouse and an excellent summer bedding plant. Low compact plants with pretty Verbena-like flower heads in white, rose, orange, scarlet, etc. They are perennials but tender in the N.

LANT-2. Pkt. 15c -French Hybrids. ach strain which is claimed oice. Otherwise same as to be extra choice. above.

LARKSPUR

Cemmon name for the annual form of Delphinium. They are amongst the very best cut flower annuals and the greatly improved strains we are offering, it is hard to conceive a more effective cut flower. They are cool weather plants and for best results should be sown in the fall. In warm sections, such as Southern California, they are sown as early as Auugst, broadcast where they are to bloom and if for the cut flower market, are sown thick like radishes and the entire plant pulled to go to market. For the home garden, on the other hand, plants are thinned out to the proper distance and allowed to branch normally for a more brilliant show of color. In the colder sections, seed should be sown broadcast in November in its permanent position in the garden. If very severe, a light mulch covering should be applied. Seed will, therefore, remain stratified and dormant throughout the winter months and with the spring thaws and first warmth will germinate and commence to grow. As Larkspur seed requires a chilling for best germination, this is the ideal treatment for best results in spring sowing.

-Cockade Type, Mixed. Pkt. 10c; oz. 80c; lb. \$9.00

A new type, recently introduced that has been especially liked by the florists and commercial growers. Tall, symmetrical plants, bearing long branches of full double florets; be sure to try this new type, this year, 4-ft. High class blend of all the varieties and colors.

- Pastel Shades. LARK-2. Pkt. 10c:

Beautiful blend of soft pastel colors, prectly blended for cutting.

-Blue Cockade. LARK.-27. Pkt. 15c

-White Cockade. LARK.-28, Pkt. 15c A pure white in this beautiful type.

Giant Imperial, Mixed. LARK-3. Pkt. 10c; oz. 80c; lb. \$9.00
Tall, upright, compact, basal branching in habit, they are most popular for cutting and garden display. Delphinium-like spikes of double flowers on 4-5-ft. stems, requirng but half the space of the old type.

LARK-10. Pkt. 15c A beautiful mid-blue color.

Blue Spire. LARK-5. Pkt. 10c: oz. 80c; lb. \$9.00

Deep oxford blue. T.ARK-11, Pkt. 15c

— Cattleya. LARK-11. Pkt. 15c A NEW late flowering rosy-lilac, highly ecommended. -- Carmine King. LARK-6. Pkt. 10c;

oz. 90c; lb. \$10.00 Improved. A new very distinct improve-nent over the old Carmine King; holds as color under trying conditions and has the largest florets of the King type to date;

A bluish-white color.

- Dainttiness Improved. LARK-14. Pkt. 15c Deeper shade of lavender-blue with trge and more fully double florets.

-- Dazzler. LARK-15. Pkt. 15c
Early flowering bright carmine.

--Exquisite Pink Improved. LARK-16. Pkt. 15c -Exquisite Rose. LARK-17. Pkt. 15c

--Gloria Improved. LARK-18. Pkt. 15c

-Lilac King. LARK-19, Pkt. 15c Rich lilac

A NEW rich lilac shading to lavender blue. LARK-20, Pkt. 15c LARK-21. Pkt. 15c -Lilac Spire.

Los Angeles. LARK-4. Pkt. 10c; oz. 80c; lb. \$9.00 Brilliant pink on salmon.

--Pink Perfection. LARK.-12. Pkt. 15c ----Rosalind. LARK.-22. Pkt. 15c Rose suffused salmon.

-- Sweet Lavender. LARK-23. Pkt. 15c A NEW light lavender-blue; very pretty. -- The Empress. LARK-24. Pkt. 15c

Pure white with large double flowers.

LARK.-26. Pkt. 15c -White Spire. A pure white, very popular.
PRICES ON ABOVE VARIETIES, SEPARATE: Pkt. 15c; Oz. 500, 1/4 lb. \$3.25; lb. \$10.00

-Miss California. LARK-7. Pkt. 10c; oz. 80c; lb. \$9.00
Beautiful deep rose on salmon, -Tall Branching, Mixed.

Pkt. 10c; oz. 70c; lb. \$7.00
A tall branching type, 4-ft. tall, that will especially suit targe border plantings. It is a choice color blend.

-Larkspur, Mixed. LARK-9X. Pkt. 10c; Ox. 70c; 1b. \$7.00

Made up of all colors and types, especially valued where one wishes to scatter the seeds in waste places or roadsides.

LATHYRUS (LATH-i-rus)

Both vines and erect plants, annuals and perennials with tendrils and showy flowers in white, shades of red, yellow and purple. The perennials grow well in ordinary soil and will stand some shade while the annuals require deep moist soil and full sunlight; provide supports and if flowers are kept picked the blooming period will be lengthened.

-latifolius, Mixed. LATH-1X. Pkt. 10c; (The perennial Sweet Pea). Useful for training on pillars, fences, old trees, stumps and stone piles, 5-6-ft. Plants early in spring.

Pink Beauty.

—Red Beauty.

—White Pearl.

LATH-2. Pkt. 10c;

LATH-3. Pkt. 10c;

LATH-4. Pkt. 10c; Red Beauty. ---White Pearl.

LAVANDULA (la-VAN-dew-la)

Lavender. A fragrant plant grown for Lavender. A fragrant plant grown for ornament in the garden and for its sweet scent when dried; the dried flowers are used to fill sachets and to perfume clothing and linens. It is grown commercially for the production of "oil of spike", aromatic vinegar and lavender water; not being hardy it is not grown much in northern gardens and must be protected over winter by unulching with coarse material. Set plants 2-ft. apart in their permanent location, in a dry, light limey soil and full sun; in rich or moist soils they do not do so well and lack the fragrance produced in an ideal location. Formally listed as L. officinalis and L. vera; annual, 2-ft.

-spicg. LAV-3. Pkt. 10c: 1/2 oz. 70c A more dwarf plant than true Lavender with whiter leaves.

-Munstead Strain. LAV-1. Pkt. 15c: Dwarf, deep lavender, 1-ft., a choice

-Vilmorin Hybrids. LAV-2. Pkt. 10c; 1/4 ox. 60c French hybrids, beautiful flowers.

LAVATERA (lav-ah-TEE-rah)

Fast growing, herbaceous annuals and shrubby perennials; the annuals are color-ial with mallow-like flowers, easily grown. The perennials are specially suited to the West Coasst section and all will bloom the first year with a little extra attention; do not transplant.

LAVT-1. Pkt. 10c -arborea. A shrubby biennial with dark veined nagenta flowers, 6-10 ft. perennial grown as an annual.

Hardy annual, white and rose-pink, malow-like flowers on large plant for show or cutting, 3-ft. trimestris var., splendens, Mixed.

LAVT-3. Pkt. 15c A new and very highly recommended German variety, large rose flowers.

—thuringiacea. LAVT-4. Pkt. 25c Light blue flowers, HP, 4 ft. treated as annuals in the N. and some-

oz. 80c: lb. \$9.00 LEONTOPODIUM

(le-on-tuh-POH-di-um)

LEON-1, Pkt. 25c The much prized Swiss Edelwiss (AYdel-vys). A tufted perennial with white wooly foliage and inconspicuous flowers, surrounded by floral leaves in star-like clusters; a most sought after subject for the alpine rock garden and sometimes grown in pots; requires rough sandy loam, plenty of room in rock pockets for its wide spreading roots and full sunlight; also good in border, best grown from very early planted seeds. -alpinum.

Pure white flowers; everlasting; grow in open meadows at 12,000 ft.

LEPTOSYNE (lep-TOS-i-nee)

Sometimes described under Coreopsis have somewhat succulent, finely divided leaves and long stemmed yellow flowers treatde as annuals in the N, and sometimes grown under glass in the winter easily and quickly grown from seeds, ing well in a light soil and a sunny location.

maritima, gr. fl. LEPT-1. Pkt. 150 (Sea Dahlia). Leafy stem and flov in. across, yellow, 3-ft. tall, hardy

-stillmanni. Leafy stems, smaller than L. maritima, golden yellow flowers, hardy annual, 1-ft.

LEUCADENDRON

(leu-kah-DEN-dron)

So. African trees or shrubs (Protean Family). Not hardy in the N. Grown boutdoors in Southern Cal. and Fla. or under glass in N.

—argenteum. LEUC-1. Pkt. 25.
(Silver Tree). One of the most noted trees of the Cape of Good Hope region where i reaches 30 ft.; interesting and showy plan with its narrow silvery white leaves closely set upon the stems; the dried leaves are used for decorative purposes. Packe contains about 20 seeds. LEUC-1. Pkt. 25c

LEWISIA (leu-IS-i-ah)

A genus of low growing perennials of the Portulaca Family with narrow fleshy leaves, often in rosettes, and pretty waxy or satiny cactus-like flowers, borne singly or in clusters. They are natives of the western states, perfectly hardy and should be given an open, well drained position in the rock garden and a mulch of leaves in the winter. Perfect drainage must be given them because of the thick starchy root which requires a period of rest.

-howelli. LEWS-2. Pkt. 25c -rediviva. LEWS-1. Pkt. 35c This is spoken of as "one of the finest four rock garden plants in the world" and was Lewis and Clark's best find. State flower of Mont. Has a dense rosette of narrow leaves above which rise beautiful silky short stemmed blossoms 11/2-in.

LIATRIS (ly-AY-tris)

Perennial plants being borne close against long wand-like spikes, very at ractive all summer and into autumn, et ective when massed in the border. Easily aised from seed and easily transplanted

Long spikes of fluffy purplish-rose flowers, hardy perennial, 5-ft.

Best in light rich sandy loam rather dry than wet. LIAT-1. Pkt. 20c

LIGUSTRUM (li-GUS-trum)

Privet. Deciduous or evergreen shrubs native of Europe, Asia and Australia. Useful as hedges and very ornamental. Some are not hardy in the N., especially the evergreen species. Easily grown from seed.

LIGS-1, Pkt. 05c -confusum.

LILIUM

(Lily). Growing Lilies from seed has become a very popular hobby with flower growers; very fine bulbs can be easily grown from seed, sowing them in flats of good garden soil, sand and leaf mold, equal parts and covering ½-in. deep; seed may be sown anytime, the growth is mostly root growth the first year, transplant out the second and by the third year good sized bulbs may be had, with many species even blooming within a year. Some sorts germinate readily, others longer and some of the hybrids very variable. We will mark offerings with planting symbols, as follows: (A) Sow March or April, outdoors or month earlier indoors, germinate in 3-6 weeks, transplant following spring to nursery row. Also can be grown as in next culture. (B) Best to start in frame or greenhouse in early spring or outdoors in the S. Germination 3-6 weeks, carry-seedlings over in frame or cool house the first winter, transplanting them out in the spring. (C) April-June outdoors in well-made seed bed, 2-5 months to germinate with top growth not appearing till following spring, transplant second year. (D) Plant outdoors in late fall, Nov.-Dec. in carefully prepared seed bed, germination and top growth the 2nd spring and transplant second year. (D) Plant outdoors in late fall, Nov.-Dec. in carefully prepared seed bed, germination and top growth the 2nd spring and transplant second year. (D) Plant outdoors in late fall, Nov.-Dec. in carefully prepared seed bed, germination and top growth the 2nd spring and transplant second year. (D) Plant outdoors in late fall, Nov.-Dec. in carefully prepared seed bed, germination and top growth the 2nd spring and transplant second year. (D) Plant outdoors in late fall, Nov.-Dec. in carefully prepared seed bed, germination and top growth the 2nd spring and transplant second year. (D) Plant outdoors in late fall, Nov.-Dec. in carefully prepared seed bed, germination and top growth the 2nd spring and transplant second year. (D) Plant outdoors in late fall, Nov.-Dec. in carefully prepared seed bed, germination an Note proper culture under each vari-description.

ety description.

NOTE: We can supply Lily Bulbs on almost every variety, either in the spring or the fall. Ask for the special lists.

Due to the continued unsettled conditions in Europe, we may not be able to offer as large a list in seeds as we should, but each week brings in a new variety so that we hope to be able to extend the list considerable before the region.

All of the following Auratum offerings are from a very noted Lily hybridizer and all from the pink strain, which is a genuine mutation and not the result of hybridizing with Speciosum. This seed is of great value to those interested in high class Auratums.

-Auratum x Aur. platyphyllum. LILY.-28. Pkt. 75c LILY.-27. Pkt. 75c

-Auratum pictum. -Auratum pictum x Auratum rubbovittatum. LILY.-26. Pkt. 75c -Auratum x rubbovittatum. LILY.-25.

Pkt. 75c

-candidum, Salonik & Form. LILY-19. A very fine variety of the Madonna Lily, still very scarce and expensive; the flowers come slightly earlier than the usual form and it seeds freely and the seedlings are more free from disease than from bulbs; sow seed in the fall to germinate the following spring, flowering in about 3 years, 3 ft., HP.

—centi-gale. ILY-20. Pkt, 50c
English cross of LL. centifolium and
Regale, which gives fine flowers of the
Regal type, 3-5 ft, HP. Culture (A).

-Centifolium. LILY.-30. Pkt. 50c LILY.-32. Pkt. 500 A high class hybrid from a Lily hybrid-izer of note.

---Davidii x Maxwell, LILY.-29, Pkt. 50c -formosanum, Price's Variety LILY-16. Pkt. 50c

The dwarf form of this easy and popurar species which flowers from seed the irst year; white trumpet, 1½ ft., HP. Culture (A).

In woodland, in moist loam rich in lead mold, this magnificent lily is entirely happy and hardy. The stem is very thick and as much as 12 ft. high, with large glossy green leaves; flowers are trumpet-shaped, 8 in or more in length, tinged green outside and striped and splashed with redpurple within. Seed is of slow germination and some time is required for plants to develop into flowering stage. Culture D.

-Gloriosa superba. LILY.-31. Pkt. 50c gloriosum.

A becutiful new German hybrid lily, 30"-60" tall, flower like L. regale, white.

LILY-26, Pkt. 35c -henryi. LILY-22. Pkt. 50c -iankae. An exteremely rare species from Bul-garia, sometimes regarded as a variety of L. Carniolicum. The flowers are bright yellow, unspotted, Culture (D), 3 ft., HP.

-longiflorum praecox. LILY-25. Pkt. 35c Pure white flowers exactly like longi-florum White Queen except that this has 4-5 flowers per stem. Easy from seed, Culture B.

(Turks Cap). Purple with dark brown marked at the control of the c -martagon dalmaticum.

Moderate sized Turk'scap flowers in deep marcon, almost black; these are the easiest of the slow germinating lilies. Culture (D) is best, 3 ft., HP.

-martagon x Hansoni, LILY-23, Pkt. 30c A very important group of hybrids, very hardy, vigorous and easy in most gar-dens; variable in color, yellows, reds and near pinks.

-martagon album x Hansoni. LILY-15 The white form of L. martagon is much nore easier in gardens than the colored carieties and these crosses should be appeared by arieties and these crosses should give specially fine hybrids.

-macrophyllum. LHLY-5. Pkt. 25c (Notholirion). Source of seed India. -Mrs. Backhouse Hybrids. LILY-21.

The most famout of the Martagon Hybrids, bulbs, even seedlings are very expensive and with some patience the gardener can obtain them with little expense from seed.

—nepdiense.

LILY-6. Pkt. 25c.

Magnificent species of striking beauty, bell-shaped flowers on slender erect stems, greenish yellow outside and soft yellow within, flushed towards the base with purplish black, very sweet scented, rosy. Culture B.

LILY-17. Pkt. 50c -ochraceum. Rather tender in the North -philippinense, formosanum. I.H.Y-7

Pkt. 25c (Philippine Lily). White tinted green at base, 1-3 ft. Culture B. -princeps, G. C. Creelman. LILY-15 Pkt. 50c

seedling should prove very fine and one of the easiest Lilies from seed, needing only culture (A). LILY-14. Pkt. 50c -pyrenaicum.

A rare species of the martagon type with reflexed flowers of greenish yellow with black dots, 2 ft., HP. Culture (D). E. K. Ball's form; bell-shaped flowers of rich yellow with a few small black dots; one of the slower lilies and best under culture (C) or (D)., 5 ft., HP.

Meadow Foam. Formally in the genus

Hardy annual plant with finely cut yellowish-green leaves and fragrant white flowers, shaded at the base into pink and yellow. This attractive little plant grows in masses in low damp places and is a lovely flower in the wild garden; easily grown from seed. LIMN-1. Pkt. 20c douglasi.

LIMONIUM (li-MOH-ni-um)

Statice, Sea Lavender, Sea Pinks. Common name for Statics and a highly prized flower in the greenhouse, border, rock garden and for dried flowers. As everlasting they are especially long lasting and of real value.

-latifolium. LIMO-1. Pkt. 15c; ½ oz. 95c Perennial with immense lavender-neads, best in a dry location, 2-ft. sially valued for floral designs.

SINUATUM: Biennial or perennial, grow as a hardy annual; leaves form a low rosette at base of the stiff angular branch ing flower stalk. These are very popular for dried flowers.

-bonduelli. LIMO-3. Pkt. 10c; oz. 65c Golden yellow flowers, 2-ft. LIMO-10, Pkt. 15c

-Kampi's Tall Improved. LIMO-5. Pkt. 15c

NOVEMBER, 1948

A new Swiss strain in a perfect blue. -Market Grower's Blue. LIMO-8. Pkt. 10c; oz. 35c; 1/4 lb. 85c A standard market strain of value:

-True Blue. LIMO-7. Pkt. 10c; oz. 50c

A fine California blue market strain.

Paste! Shades.

LIMO-9. Pkt. 15c.

Choice Mixed.

LIMO-8X. Pkt. 10c: oz. 45c; 1/4 lb. 85c

LINARIA (ly-NAY-ri-ah)

Rather low growing plants, annual, biennial and perennial (Figwort Family), trailing and erect. The flowers are like miniature Snapdragons. The annuals should be started indoors. They are all easily grown from seed. Kenilworth Ivy formally classified here is Cymbalaria Muralis (which see).

-maroccana, Early Bouquet. LINA-1. Pkt. 15c; ¼ oz. 60c
Grows 8-in. tall and covered with dainty
flowers in shades of pink, rose, cream,
yellow, lavender and white, blooming
freely all summer and into the fall.

-Fairy Bride. LINA-2. Pkt. 15cs A French strain similar to Fairy Bouquet.

origanifolium. LINA-4. Pkt. 30c LINA-3. Pkt. 60c A very rare Spanish species with pink and purple flowers, very attractive erect growing for rock or wall garden, 5", HP.

LINDHEIMERA

Star Cup. An easy attractive everblooming annual with flowers that have five wide golden petals arranged to form both a star and a cup, cuts well, 2 ft.

LINNAEA (li-NEE-ah)

Twin-flower. A dainty trailing plant, having small glossy evergreen leaves and small pink bell-shaped very fragrant flowers. HP. LINN-1. Pkt. 50c

LINUM (Ly-num)

—flavum.

Flax. Annual and perennial plants and shrubs having blue, white, yellow and red flowers. They are very popular in flower gardens. Grow in full sun, the annuals can be sown direct to garden; they do not stand frost. The perennials can be started indoors and some will bloom first year. LINM-1. Pkt. 20c

This is a pretty rock garden plant, perennial, golden yellow flowers, 1-ft. tall, half hardy in N. -- nana compacium. LINM-2. Pkt. 30c

An extra dwarf compact strain, 6-in. tall with yellow flowers, especially attractive in the rock garden. grandiflorum, Blue. LINM-3. Pkt. 10c;

The most popular flowering Flax, annual, used much for cut flowers. -- roseum. LINM-4. Pkt. 19c; ½ oz. 40c - rubrum. LINM-5. Pkt. 10c; ½ oz. 40c Same in red flowers. Very popular.

perenne, var. sibiricum.

The most reliable perennial Flax. The flowers are a good blue, 18 inches. —lewisi. LINM-7. Pkt. 25c Nothing more graceful than this native Mont. blue Flax, 18-24-in. tall, June-July.

LITHOPHRAGMA

(lith-oh-FRAG-ma)

Small plants of the Saxifrage family from western America with rounded, deeply cut basal leaves and racemes of a few quite showy pink or white flowers. They are woodland plants and will grow under pines or in the shady rock garden.

—parviflora. LITH-1. Pkt. 25c
The petals are so deeply cleft as to
give a fringed appearance to the flowers;
occasionally produces finy bulblets in the
leaf-axils or in place of flowers, 4-12", HP.

LITTONIA

-modesta.

-Dorothea.

erecia.

LITT-1, Pkt. 25c

LOB-5. Pkt. 15c

LOB-12, Pkt. 20c

LOBELIA (loh-BEE-li-gh)

Annual and perennials, flowers generally blue or red. For garden purposes they are divided into the 2 classes. The annuals being most popular, are used as green touse plants, in beds and also as edgings, they are tender annuals.

ERINUS: The main annual species, most popular as a small plant for the border. Start seed in Jan. or Feb. indoors for plooming size plants ready to set out in late may, when they will bloom till frost.

Blue Stone.

New. Dwarf plants covered with clear blue flowers, excellent for rock garden. -Cambridge Blue. LOB-2. Pkt. 15c Compact variety, in clear light blue flowers, pretty in rock garden.

-Crystal Palace. LOB-3. Pkt. 15c This is a compact strain with rich deep blue flowers, dark foliage, 4-in. talk

Dwarf strain in a bishop's violet -Emperor William. LOB-6. Pkt. 15c This is a dwarf compact strain of this beautiful flower, color Cornflower-blue.

A compact form of the familiar L. erinus, from India, with blue flowers. gumila splendens. LOB-13. Pkt. 25c A new Swiss variety with dark purple-violet flowers with large white eye, highly recommended, HA, 4 inches.

ERINUS PENDULA: Trailing type and specially useful for window boxes and anging baskets, where the plants tend to ang from the box.

Sapphire. LOB-8. Pkt. 15c Dark blue, with large white eye, showy. LOB-10. Pki. 20c This is a species from India, described as "tall plant with short branches, rose or white flowers crowded in short racemes." Best to treat as an annual.

LOMATIUM (loh-MAY-shi-um)

Perennial plants of the Parsley Family found in dry soils in the W. U.S. They are good rock garden or front or border plants or in gravely soils in the wild garden. Nearly or quite stemless, from 2-in. to 2½-ft. tall with flat heads of small white or yellow flowers. A dwarf species suitable for the sunny rock garden, with very small leaves and branching stems bearing many pale-lilac flowers. HP. 6-in.

Improve blue, especially valued on the market.

-macrocarpum. Native Mont. species, white flowers, 10-14 inches, May.

LONAS (LOH-nahs)

-inodora. LONA-1. Pkt. 20c The Golden. True golden yellow, a very good plant for edging and bedding, annual; use with Ageratum for yellow combination; also fine for winter dried flowers. Easily grown in any type of soil, space 10-in. apart for cutting, closer for edging or bedding, mid-summer bloom, 2-ft.

LONICERA (loh-NIS-e-rah)

Very popular and easy shrubs and vines, called Honeysuckle. Quite easy and prompt from seed and quickly develop into flowering plants.

-syringantha. LONI-1, Pkt. 50c Erect growing with slender branches, small leaves of dull bluish green and a profusion of fragrant rosy-lilac flowers. Hardy, Fragrant.

LONI-2, Pkt. 25c -ciliosα. Western species.

LOTUS

The genus is confused with the common name of water plants called Lotus, which are Nymphaea. The correct genus belongs to the Pea Family. They are native to So. Europe.

--tetragonolus. LOT-1. Pkt. 15c Winged Pea, Asparagus Pea. A creeping annual leguminous plant with purplish red flowers and pods, which are edible when young. They thrive in sunny, dry locations and valuable for ground cover

LUCULIA (leu-KEU-li-ah)

Tender shrubs from the Himalayas having large leathery leaves and showy corymbs of white, rose and red flowers; easily grown under glass in moderate temperature and bloom through the winter. They can be set outdoors during the where they make attractive

gratissima. LUCU-1. Pkt. 25c
The most reliable species, coming true from seed.

LUFFA (LUF-ah)

Lootah. Tropical climbing plants with large white flowers and cylindrical or oblong fruits. When ripe they have dry papery shells which contain a network of strong fibres which is commonly called "dish cloth" and is used for washing purposes. Culture same as for gourds.

LUFF-1. Pkt. 10c Very long fruits.

Dish Cloth. Large fruits. LUFF-2, Pkt, 10c

-cylindrica mocrocarpa. LUFF-3. Pkt. 10c

LUNARIA (leu-NAY-ah)

There are two important kinds, a biennial and a perennial that are used for dried flowers in this genus. The seed pods are flat and when matured, these open bouquets or the entire plant can be used as a bouquet; the flowers are white to crimson.

biennis, Violet. LUNA-1. Pkt. 10c; Honestly, Biennial, with shining silvery seed pods for winter decoration, 2-ft., Violet flowers.

— White. LUNA-2. Pkt. 10c; ½ oz. 45c — Dark Crimson. LUNA-3. Pkt. 10c; 1/2 oz. 45c

LUPINUS (lu-PI-nus)

The flowers, shaped like those of the The flowers, shaped like those of the peas, are borne in great profusion on long stemmed spikes; both annual and perennial sorts are excellent for display in the border; sun or partial shade and requires moisture. Blooms May and June and it cut back will produce second crop of flowers, sow in open ground as they resent moving, being tap rooted.

-arboreus, Lavender Tree. LUP-1 Tender Perennial shrub growing man-gh with lavender flowers.

-Yellow Tree. LUP-2. Pkt. 15c LUP-12. Pkt. 50c -aridus. A rock garden dwarf, very rare in cultivation and a scarce species.

-hartwegii, Giant King, Blue. LUP-3. Pk. 15c Annual, 3-ft. this is a recently introduced strain with larger flowers, closer spaced on longer spikes and in more distinct colors. Oxford blue.

low and ro --- nanus, Blue. LUP-5. Pkt. 10c; oz. 60c MATHIOLA (mat-THY-oh-lah) Small seeded type, native of California, 1-ft. annual. Blue.

White shaded yellow and purple, an-

A greatly admired species for the exposed sunny rock garden, easily grown but not long lived, HP.

-polyphyllus, Mixed. LUP-8. Pkt. 15c; Tall perennial with winged flowers blooming most of the summer, colors purple, white and rose.

The most beautiful of all hardy Lupin a rare and showy combination of col with bright pastel colors predominating.

---subcarnosus, LUP-10, Pkt. 10c; oz. 45c Texas Blue Bonnet. Small seeded, strong bushes, 15-in. tall bearing in June massive flower spikes closely set with large deep blue flowers.

—Alaska Lupin. LUP-11. Pkt. 15c

Alaska Lupin, collected on Kodiak Island and not yet identified but no doublt L Arcticus, which is beautiful 18-in., colorceam, pinkish lavender, magenta and shades of purple and blue.

LUTKEA (LUT-ke-a)

Very finely cut foliage suggesting a mossy saxifrage, forming green carpets yards across, with short spikes of bloom. Quite easy on the rock garden on the shady side of a large rock.

LUTK-1. Pkt. 25c Tiny spikes of pale yellow over a mat of yelvety green, HP, 46".

LYCHNIS (LIK-nis)

Brilliantly colored flowers and easily rown from seed; if sown early indoors

LOMA-1. Pkt. 20c most of the species will flower in June and July, ordinary garden soil and a fairly dry location with plenty of sun. They are related to the genus Silene. The dominant color of the species is red and the flower 5-petaled.

Same as above with deep rose-pink flower.

-coeli-rosa. LYCH-1. Pkt. 10c Rose of Heaven. Crimson-red, a new arriety and color. Free flowering annual LYCH-1. Pkt. 10c

-Mixed. LYCH-2. Pkt. i0c; 1/4 oz. 25c Rose of Heaven. Rose-red, red, white.

Mullein Pink, Rose Champion, Dusty Miller. Much branched biennial or perennial with wide woolly leaves and large crimson flowers, terminating each branchlet. Other plants are also called Dusty Miller, see Centaurea. -coronaria. LYCH-3. Pkt. 15c

-viscaria splendeus. LYCH-4. Pkt. 10c: 1/2 oz. 30c

Hardy perennial, fiery red flowers, 15-in all, very beautiful.

LYSIMACHIA (ly-si-MAY-ki-ah)

Loosestrife, which is also used for the genus Steironema, both requiring similar reatment and moisture situations. Perennial, bloom in summer, ver

LYSM-1. Pkt. 20c Spotted Loosestrife. Dainty golden yel-low flowers in whorls on strong upright growing plants; useful in shady, poor soils, fl. stems 3 ft. long, June-July, HP.

LYSM-2. Pkt. 30c -ramosα.

MACHAERANTHERA

tanacetifolia. MACH-1. Pkt. 20c
Takoke Daisy. Most desirable for edging, bedding and cutting, best of the Blue Daisies. Flowers large blue-lavender with little golden centers and good length stems: foliage fern-like. Long blooming period, mid-lune to Nov., sow seeds early and to get even germination place seeds in the refrigerator for a week, 20-in.

MACLEAYA (mah-KLAY-rah)

Plume Poppy or Tree Calandine Formerly classed as Bocconia cordata. A tall plant with featherty sprays of small flowers held above the grayish-green leaves. Makes an effective background or specimen plant, perennial, 6-ft.

—Japonica.

MACH-2. Pkt. 15c

— microcarpa. MACH-2. Pkt. 15c — microcarpa. MACH-3. Pkt. 25c Similar to M. cordata in habit but seed vessels purple, HP, 6 ft.

MAGNOLIA (mag-NOH-li-ah)

Deciduous and evergreen shrubs and trees; many are very attractive when in bloom having very large flowers. Most of them are not hardy in the North and especially the evergreen sorts. They are difficult to transplant and thus when grown from seeds, more liable to come established. Grow in rich porous, moderately moist soil, preferring a sandy or peatty composition; seed can be started in pots and when established moved to their permanent location.

-Campbelli, Mixed. MAGN-1. Pkt. 25c Flowers in white, pink and red, and purple outside, measuring 10 inch across, grows to 70 ft. tall and hardy from Va. southward.

MAGN-2. Pkt. 25c ---Red. MAGN-3. Pkt. 25c ---White. ---Pink. MAGN-4. Pkt. 25c globosa. MAGN-5. Pkt. 25c Dwarf handsome tree with pretty white owers. MAGN-5. Pkt. 25c

MAGN-6. Pkt. 25c --obovata. MAGN-7. Pkt. 50c ---wilsoni. Shrub or small tree with moderate-sized leaves and fragrant white cup-shaped flowers 3-5 in. across, June, 20 ft.

MALOPE (MAL-oh-pee)

-grandiflora, alba. MÄLO-1. Pkt. 10c;

Mallow-like annuals common in European gardens; large flowers blooming from early summer till frost from seeds planted early in good garden soil. Hardy mnual 3-ft., white flowers. -purpureα. MALO-2. Pkt. 10c; ½ oz. 25c

-roseα. MALC-3. Pkt. 10c; ½ oz. 25c -Mixed. MALO-4X. Pkt. 10c; 1/2 oz. 25c

MALVASTRUM (mal-VAS-irum)

A genus of plants and sub-shrubs called False-mallow with spikes of red, orange or yellow flowers. Easy culture in ordin-ary garden soil.

m longer spikes and in more distinct closer. Oxford blue.

— Mixed. LUP-4. Pkt. 10c; oz. 70c

Annual, 2-ft. in blue shades, white, yel
w and rose.

— Coccineum. MALV-1. Pkt. 20c

Cow-boy's Delight. Orange-scarlet flow are 6-10 in. tall; August; drought resistant. Prairie Mallow. Flowers red or copper colored.

Stocks. Annuals and perennials (Crucifer Family) of which the garden species consists of 2 species and one belonging to Malcomia. The genus Cheiranthus is related and to which the Wallflower belongs: lated and to which the Wallflower belongs:
M. incana. (Queen or Brompton Stock or Gilliflower). This is the main garden stock, it is perennial or biennial but grown as an annual and for late summer and autimn flowers. Seed is usually sown outdoors in May or June and bloom 15 weeks later, or start them 6-8 weeks earlier indoors. Keep at a temperature around 65 degrees. For greenhouse flowering seed is sown about end of Oct.

Giants of California, Mixed. STOK-1 Pkt. 20c; 1/4 oz. 90c

Superb branching type producing im-tense spikes of 2-in. florets and averag-ing better than 70% double; one mammath-pike per stalk can be produced wher ansplanted 4-6-in. apart in beds. Bes-train available for commercial growers.

-Early Colonial Branching, Mixed. STOK-2. Pkt. 20c; 1/4 oz. \$1.00

Extremely base branching, this ty oes not produce a large center spik 2-15 branches per plant, bearing doub orets, are typical of this strain, 2½-tr.

—Mammoth Beauty of Nice, Mixed.

STOK-3. Pkt. 15c; ¼ oz. 50c
Comes into flower just as early as the
Dwarf Ten Week Stocks and forms a
pyramidal-shaped plant; this the most
popular class for general garden use, 1½-

—Double Dwarf 10 Weeks. STOK-5.

Pkt. 15c; ½ oz. 40c

This type is especially recommended for outdoor growing in the East and Middle West; blooming in 10 weeks from seed, 1-ft.

STOK-9, Pkt. 25c -- Gardenia. Large single pure white flower.

STOK-11X. Pkt. 250 The very best blend of single flowered varieties.

-bicornis. STOK-20. Pkt. 10c; 1/4 oz. 30c Evening Stocks. A hardy annual, 15-in high, sweetly fragrant after twilight hour or after a shower; small lidac flowers, July Sept. Sow seeds indoors or plant ou Sept. Sow seearly in May.

MATRICARIA (mat-ri-KAY-ri-ah)

Mostly annuals (Composite Family) with a few biennials and perennials, foliage freey cut with small flower heads. They are easily grown from seed, used in the border and are around 2-ft. tall.

-capensis alba plenissima. MATI-l Pkt. 200

Feverfew. Also listed as Chrysanthemum parthenium. A perennial but grown as an annual. 2-ft. white flowers, used especially for mixing in bouquets of other flowers similar to Gypsophila.

exirmia gr. fl. Ball's Double. MATI-2 Pkt. 25c; 1/4 oz. \$1.00 One of the best white cut flowers, 20-in.

-Golden Ball. MATI-3. Pkt. 20c;

This variety forms a dwarf dense bush of over 12-in. in height covered with rich golden yellow ball-shaped flowers. It is of great value for pot culture and making up floral sprays.

MATI-4. Pkt. 25c - Silver Ball. Same as Golden Ball but with white double ball-shaped flowers.

MAURANDIA (mau-RAN-di-ah)

Perennial climbing plants of slender habit, native of Mexico and belonging to the Figwort Family. They are tender and can be handled as tender annuals for summer baskets or for winter flowering vines. Thrive in fibrous loam with leaf mold and some cow manure. Fine also for trellis. trellis.

MAUR-1. Pkt. 25c -scandens.

MECONOPSIS (me-kon-OP-sis)

Annuals, biennials and perennials (Poppy Family). They generally require a cool moist summer and a rich warm sandy loam in a sheltered partial shady position. They make an attractive group in the border. The annuals should be started early indoors and set out after frost danger is over; the perennials are best carried through the summer in pots in cold frame and set out in Sept.

MECO-1. Pkt. 25c Perennial, very pretty with large blue Poppy-shaped flowers, for a cool place in the rock garden, June-July, 15-in. tall.

—betonicifolia. MECO-2. "kt. 25c
Perennial, to 6-ft., blue or bluish-violet flowers, 2-in. across in flat top clusters and one of the finest blue flowers in cultivation but requires a good flower grower in the E. States. Shelter it from intense heat and drying winds and give applications of liquid manure during its flowering season. MECO-2. 7kt. 25c

-cathcarti. Perennial, golden yellow flowers, 2-3-in across.

Welch Poppy. Perennial, 1½-ft., much cut leaves with silvery siteen beneath and large solitary pale yellow Poppy-like flowers. -cambrica. MECO-3. Pkt. 20d

flowers.

—aurantiaca fi. pl. MECO-12. Pkt. 35c
The Welch Poppy unlike the Asiatic
species, is very easily grown under average garden conditions; makes dense tuft
of bluish leaves 6 in. high above which
are borne singly poppies 2 in. across in
great profusion; in this form they are of
rich crange fully double with some coming single, 1½ ft., HP.

A very variable species with 5-petall flowers of light to dark blue, pinkish purplish, borne singly on very short stem usually, but not always, biennial, inches. MECO-11. Pkt. 25c

MECO-6. Pkt. 20c -nepalensis. Yellow Himalayan Poppy. Large lectored flowers in racemes, 4-6 ft.

MECO-9. Pkt. 25c Same with purple Poppy-like flowers. —simplicifolia. MECO-7. Pkt. 25c Biennial with solitary Poppy-like clear blue flowers, 3 inches across, rising from the tufted rosette of leaves.

-villosa. MECO-10, Pkt. 50c Used to be listed as Cathcartia villosa Heart-shaped leaves covered with white hair; golden-yellow poppy-like flowers or stems 1½,ft. long.

-wallichi. MECO-8, Pkt. 25c Satin Poppy. 4-6 ft. biennial forming a mound of finely cut, silvery foliage, and bears pale blue flowers 2-in. across.

MESEMBRYANTHEMUM

(mes-em-bri-AN-the-mum)

(mes-em-bri-AN-the-mum)
These are tender plants, best grown in dry, gritty, well drained soil, care being used to water them from below; usually started indoors; low growing, fleshy, succulent plants, many of them having striking, glistening ice-like points on the foliage; they are natives of hot, dry barren parts of S. Africa. They are tender in the N. and when grown outdoors they must be wintered in a cool, well ventilated, greenhouse. In California and Florida, a number of them are grown in the open and due to the dry climate in the West, they do especially well, They make nice pot plants and should be given a light dry gritty soil with the best of drainage.

MESE-2. Pkt. 25c -criniflorum. Livingstone Daisy. New. Very rich flowering in beautiful bright and varied colors.

-crystallinum. MESE-3. Pkt. 15c Now Cryophytum crystallinum. Ice plant, an easily grown annual and used for a ground cover in mild climates and in porch or window boxes in the N.

MIBORA

Double Giant Excelsion, Ealls No. 2.

STOK-7. Pkt. 25c
Each plant produces one large flowering bulbs.

WIBO-1. Pkt. 50c
A rare tiny flowering grass for rock gardens, especially for carpeting small

MARIGOLDS

We try to list every variety of Mari-gold that has any real merit and have dropped old varieties that have been re-placed by newer and improved varieties.

AFRICAN MARIGOLDS are strong The AFRICAN MARIGOLDS are strong feeders requiring plenty of wafer, therefore plant it in the richest, most favorable section of your garden. Seeds may either be sown where the plants are to remain or they can be started indoors and transplanted out in late May. Give the plants plenty of room, in most cases about 3-ft. apart.

TALL AFRICAN NOVELTY TYPES.

AFRICAN MARIGOLDS. These are the large flower type, the plants usually 3-5-ft. high and the flowers up to 4-5-in. across. They make excellent displays in the flower border, can be be used as hedges and produce great amounts of cut flowers. It comes in odorless foliage in some varieties.

-Treasure Chest. Pkt. 15c; 1/2 oz. 80c large Chrysanthemum flowered types with a wide range of color and bloom forms all early flowering.

-Crown of Gold. MARY-1. Pkt. 10c; Collarette type with odorless foliage, golden yellow flowers.

-Gigantea Sunset. MARY-2. Pkt. 10c; Giant Flowered. Mixed. Huge flowers 5-in. across, colors orange, yellow and primrose, 3½-ft. Full double huge deep orange flowers,

-Orange. MARY-3. Pkt. 15c; ½ oz. \$1.20 -Golden Glow Mary-4. Pkt. 10c;

½ oz. 60c

-Mission Giants, Goldsmith. MARY-5, Pkt. 10c; 1/2 ox. 90c A new personality in Marigolds of exceptional merit. Plants about 1½-ft. with an extra amount of vigor and under field conditions the plants, which are base branching, produce 8-12 stems of excelent cutting bright blooms, 4-5-in. across and in almost perfect ball-shape.

Golden Yellow, Odorless foliage.

— Yellowstone. MARY-6. Pkt. 15c Golden yellow, incurved globular form, 2½ inch flowers and rather late, 3-5 ft. TALL AFRICAN DOUBLE SORTS: Tall

All-Double (Fistulosa Type). An especially fine tall branching strain with enormous flowers of the quilled type. 100% double with huge perfectly formed flowers. They make excellent cut flowers and are far vorites with the Florists, 2½-ft.

-All-Double Gold. MARY-7. Pkt. 10c; ½ oz. 780c -All-Double Lemon. MARY-8. Pkt. 10c; ½ oz. 80c -All-Double Orange, MARY-9, Pkt. 10c;

1/2 oz. 80c -All-Double, Mixed. MARY-10X. Pkt. 10c; 1/2 ox. 80c -Lemon Queen. MARY-11. Pkt. 10c;

Los Angeles florist strain, excellent cut ower lemon yellow, 2½-ft. -Golden Emblem. MARY-12. Pkt. 10c; A rich gold with very large flowers, mid shade between Lemon Queen and Orange Prince, 2½-ft.

-Orange Prince. MARY-13. Pkt. 10c: $\frac{1}{2}$ oz. 90c Los Angeles florist strain in true gold

CARNATION FLOWERED TYPES: The blooms are shaped like a canation, are loosely ruffled broad petaled form on 2-ft.-2½-ft. branching, nearly 100% double.

-Burpee Gold. MARY-14. Pkt. :0c; 1/2 oz. 50c Odorless foliage, bright gold, flowers nearly 100% double.

-Golden Crown. MARY-15. Pkt. 10c; 1/2 oz. 50c
Tom Thumb, dwarf strain, 1-ft., golden
yellow, excellent plant for low bedding.

-Yellow Supreme. MARY-16. Pkt. 10c; An exceptionally pretty lemon yellow, (G. M. in 1935), 2-ft.

-Golden West. MARY-46. Pkt. 10c ½ oz. 45c Early flowering, dwarf strain than Guinea Gold, rich orange, 2-ft.

-Guinea Gold. MARY-17. Pkt. 10c; Vivid golden orange of great merit, excellent cut flower.

-Gypsy Jewels. MARY-18. Pkt. 10c Wide range of brilliant shades of orange, yellow and primrose. Dwarf growing gigantea type, sweet scented 4-4/2-in. flowers on 12-15-in. plants early, compact, neat.

-Pot O'Gold. MARY-19. Pkt. 10c; 1/2 oz. 50c

Deep golden orange, 100% double, dwarf growing gigantea type, 4-4 $\frac{1}{2}$ -in. flowers on 12-15-in. plants, neat and compact. Little Giants, Mixed. MARY-20 Pkt. 10c: ½ oz. 90c
A collection of dwarf large flowered marigolds, 15-in. tall, pretty in the border, -Early Sunrise. MARY-51. Pkt. 15a

Dazzling golden yellow flowers; belonging to the Dixie Sunshine type, 4 ft. -Collarette, Crown O'Gold. MARY-54. Pkt. 15c
This won the G. M., A.A.S., 1937, odorless foliage, flowers bright golden orange;
very good.

FRENCH MARIGOLDS. Mostly small plants 12 to 24-in high, with smaller flowers than the African; they are espe-cially good for bedding and the smaller varieties, excellent for edging. Some make fine pot plants.

-tricolor, Mixed. MESE-4, Pkt. 15c NEW HARMONY TYPES:

(Tagetes Patula). -Gold Crest.

MARY-22. Pkt. 10c;

Golden yellow flowers, 2-in. crested centers of quilled petals surrounded by several guard petals, very early and free flowering. 8-in. tall.

water; too strong feeding and watering will throw them to foliage at the expense of the flower; do not fertilize this type. Seed can be started indoors, but as a rule better success will be had by planting the seeds early in May, where the plants are to remain, thinning them out to one plant.

Marigolds are fairly hardy and therefore able section of your garden. Seeds may either be sown where the plants are to remain or they can be started indoors and transplanted out in late May. Give the plants plenty of room, in most cases about 3-ft. apart.

The FRENCH MARIGOLDS are very light feeders and require a limited amount of the sping. There are many wonderful plants in both types that have been developed recently and we will always offer the best as they are introduced and we especially urge every flower grower to try at least a half dozen Marigolds every year.

-Golden Harmony, MARY-23, Pkt. 10c:

Luminous golden yellow, both center and guards, compact 11-in. plants, 100% double.

-Golden Supreme. MARY-24. Pkt. 10c; Larger flowers than Golden Harmony and taller, 11/2-ft.

Hormony. MARY-25. Pkt. 10c; Deep orange, marcon collar, broad petals and very even growth, early, 1-ft. Melody. MARY-26. Pkt. 10c ½ oz. 50c Clear self golden yellow throughout, early, free flowering, 1½-in. flowers, 1-ft.

-Orbit. MARY-27. Pkt. 10c; 1/2 oz. 35c Golden yellow center, reddish brown guard petals, compact, 100% double, 1-ft. -Spotlight, MARY-28, Pkt. 10c; 1/2 oz. 35c Yellow center, mahogany border, 13/4-in.

-Winter Harmony. MARY-32. Pkt. 10c2 Tall, winter flowering greenhouse variety, golden orange crested centers with reddish brown guard petals, 2½-in. across, very even growth, long stems, 100% double.

A striking brilliant blend of African and

-Dwarf Harmony. MARY-33. Pkt. 10c; Uniform 11-in. plants, coming in fanciful two tone combinations from lemon yellow to dark red.

FRENCH-Tall Double (30-in.)

-Australian Giant. MARY-36. Pkt. 19c Tall double, or grendon free. Brownish yellow flowers, 2½-ft. -Josephine (Single Brown) MARY-52.

Pkt. 15c
An especially good florist variety for cut
flowers, grown outdoors, 3 ft. Color brown. -Lieb's Tall Winter Flowering.

MARY-35. Pkt. 10c; ½ ox. 50c Deep brown, single and semi-double flowers for winter growing under glass. -Tall Harmony. MARY-34. Pkt. 10c;

½ oz. 35c

Double Harmony hybrids, excellent for cutting or display.

FRENCH DWARF DOUBLE: -Robert Beist. MARY-48, Pkt. 15c

maroon, 12 inches high. Royal Scot, All Double.

Pkt. 10c; ½ oz. 50c

Dwarf, compact, 100% double, rich mahogany and gold in uniform stripes; extra
select strain, 1-ft. -Sunbeam. MARY-31. Pkt. 10c;

Pure golden yellow, pretty, 15-in. tall. —Double Monarch, Mixed. MARY-38.

Pkt. 10c: ½ oz. 50c

Compact habit with large flowers, fascinating new shades; a rich color blend.

FRENCH-Dwarf Single (10-in.) Ferdinand. MARY-49. Pkt. 15c Single flowers, golden yellow flanked mahogany red, showy, early blooming and very free flowering, 20-24 inches.

-Fire Cross. MARY-41, Pkt. 10c; Single, dwarf, deep orange-yellow blotched maroon, 10-in.

-Flosh. MARY-40. Pkt. 10c; 1/2 oz. 40c New red and gold bicolor, a new single type. Large single flowers 134-in. across in glowing shades of tawny gold to mahogany, plants mound-shaped, ideal for borders and pots, also cutting. 15-in.

-Legion of Honor. MARY-42. Pkt. 10c; Single dwarf yellow blotched brown. FRENCH DOUBLE MINIATURE

-Butterball. MARY-21. Pkt. 10c; Soft butter yellow with maroon on ter petals, very free flowering, 8-in. Spry. MARY-29. Pkt. 10c; 1/2 oz. 50c Yellow crested centers with red guard etals, 1½-in. across, blooms in less than weeks, 9-inches.

-Sunkist. MARY-30. Pkt. 10c; 1/2 oz. 50c Bright golden-orange, dandy companion Butterball, flowering very early $1\frac{1}{2}$ -2-in.

Yellow Pigmy. MARY-47. Pkt. 15c A very dwarf bright yellow, 10 in. -Gem Mixture. Pkt. 15; 1/2 ox. 70c

Pkt. 15: ½ oz. 70c

A new Dwarf Marigold mixture we call
rour special attention to. Like the miniaure varieties, such as Spry, from which
his blend is made, the compact plants
etain their neat form throughout the sumner heat and continue to bloom from the
earliest until frost. -Signala pumila. MARY-44. Ekt. 10c;

Tagetes. Bright yellow, tiny single flowers in great profusion on compact plants; fine for edging or filling up bare spots in rockery, 8-in.

----Little Giants. MARY-45. Pkt. 10c:

Deep orange in color, only 6-in. tall, becautiful for edging or for bare spots in rockery, very free flowering, tiny single llowers. Gnome. MARY-43. Pkt. 10c: 1/2 oz. 50c Tagetes signata pumila. A very dwarf compact single form, pretty orange color; beautiful edger and for rock garden, 6-in.

MICHELIA (my-KEE-li-αh)

Asiatic shrubs and trees belonging to Magnolia Family. They are easily grown from seed; not hardy in the North but can be grown outdoors in the South.

—cathcarti. MICH-1. Pkt. 30c M. Sylvattica: Annual or biennial, 8-in,-

MICH-3. Pkt. 30c

MELIA (MEE-li-ah)

Bead-tree. Deciduous or evergreen trees and shrubs native of tropical Asia and Australia. They can be grown only in the South.

MELA-1. Pkt. 35c China-berry or Umbrella-tree. Grown in the South where it stands a few degrees of frost; grows to 50 ft.. with graceful binnate foliage, fragrant lilac flowers porne in loose panicles, followed by yelow oval fruits that remain for a long time.

MELOTHRIA (me-LOH-three-ah)

Climbers of the Melon Family with rai white or yellow flowers and attracti small fruits; treat same as for Gourds.

MELO-1. Pkt. 15c A perennial climber best grown as an anual, start seeds indoors setting out in

MIGNONETTE

(Bot. Reseda, re-SEE-da, odorata).

These sweet scented plants are excellent for pots or boxes, beds and borders and the improved varieties make fine cut flowers; they are also excellent for bees, yielding a large amount of excellent honey; full sun or partial shade and best in moderately rich sail, sow seeds in open ground as they develop rapidly and resent moving; successive sowings will furnish moving; successful sowings will furnish moving; to be to grow them as annuals, starting seeds as early as the first of May, 6-15-in tall.

-Allen's Defiance. MIG-1. Pkt. 10c; 1/4 oz. 25c

-Machet Giant Flowering. MIG-2. Pkt. .5c: 1/4 oz. 40c This is a special straing pyramidal growth.

-Machet Golden Goliath. Pkt. 15c; 1/4 oz. 40c
Special strain. Golden yellow flowers,
large and very fragrant. -Machet, Red Goliath, MIG-4, Pkt. 15c;

-Machet New York Market.

MIG-5. Pkt. 15c; ¼ oz. 40c Special Strain. -Machet, Special Mixed.

Pkt. 10c: 1/4 oz. 35c

-grandiflora Improved. MIG-7. Pkt. 10c; oz. 35c

MIMULUS (MIM-eu-lus)

Tender annuals and perennials, having large oddly shaped 2-lipped flowers of brilliant colors; excellent for boxes, baskets, house plants or for the border as well as for the greenhouse, the more tender sorts when grown outdoors should have some shade and protection from the wind and plenty of moisture. Germinate the seed at around 60 degrees. They are all grown as annuals.

Star of Love.

MYOS-6. Pkt. 25c
Very floriferous, sky-blue, exquisite pot plant.

MYOS-7. Pkt. 15c
Blue.

—scorpioides.

True For-get-me-not, large flowering blue, formally M. palustris.

MIM-1. Pkt. 15c -cardinalis. --cupreus (tigrinus) Hybrid. MIM-2 Pkt. 15c

1-ft. tall, with flowers in contrasting stripes and spots in many colors. MIM-3. Pkt. 15c --- Espana.

guttatus. MIM-6. Pkt. 25c More or less prostrate with brilliant inch long yellow flowers; hardy. From the Rocky Mountains.

MIM-7. Pkt. 25c Large red flowers at 1-2 ft. Requires constant moisture and as cool as possible. Abundant at Logan Pass in Glacier National Park. A perennial growing masses the size of a wash tub along cold streams.

Mixed.
All varieties mixed. MIM-5X. Pkt. 10c

MIRABILIS (my-RAB-i-lis)

Four O'Clocks. Tender biennials grown best as an annual in the North, bushy plants with attractive red, pink, white, lilac and yellow flowers, flowers opening in the P. M. on sunny days, July to frost; space plants 2-ft. apart, 2-3-ft. tall. They make the best for border or bedding. For a hedge, plant them 1-ft. apart and in the border 2-ft. apart. Best to saw seed in the open ground about midde of May, they do not stand frost.

-jalapa, Mixed. MIRA-1. Pkt. 10c; oz. 25c Dwarf Variegated. MIRA-2. Pkt. 15c growing with variegated leaves,

—longiflora, White. MIRA-3. Pkt. 10c Much larger flowers, sweet scented.

GLOBE TYPE, GIANT DOUBLE ----Violet. MIRA-4. Pkt. 10c

" MIRA-5. Pkt. 20c -uniflora. Bright rose blossoms in trumpet-in-trumpet form, each long-tubed blossom rising from a second "flower" of the same vivid rose. Showy, and unusual. A free

-Mixed Four O'Clocks. MIRA-6X. Pkt. 10c All types mixed.

MORAEA (moh-REE-ah)

African Iris. Bulbous Irids from Africa, many new to civilization, flowering in spring in wide color range, culture similar to Freesias.

Those that have rhizomatous roots are called DIFTES and are treated the same as Iris. Not hardy in the N. but can be as a pot plant and grown indoors in winter; in the S. they can be grown outdoors.

—belenocoides. MORE-1. Pkt. 25c Grows on rocks at 12,000 ft., violet colored flowers and should be good in the rock garden.

MORE-1. Pkt. 25c -catanulata. Dietes. Low growing variety, broad foliage, prostrate habit, if staked will grow 4-6 ft. Flowers waxy white.

-iridoides johnsoni. MORE-2, Pkt. 25c

Oakhurst Hybrids. MORE-3. Pkt. 25c Cross between two rare species and a stinct improvement, flowers over 2" cross resembling miniature Japanese Iris, olor pleasing shade of ivory, marked the bright orange or yellow and violet.

-polystrachia.

MICH-2. Pkt. 30c | MOLUCCELLA (mol-eu-SEL-ah) | NEMESIA (ne-MEE-si-ah)

MULU-1. Pkt. 15c Bells of Scotland. The branching stems are closely set in elongated hyacinth-fashion with big bell-calyces of pale, translucent green and within each calyz lies a curously formed little white flower. Its a fine cut flower or the spikes can be dried for winter. Easily grown, does well in dry soils, perennial.

MONARDELLA

(mon-ahr-DEL-ah)

Annual and perennial plants grown in erock garden and native of Calif., have g fragrant foliage and two-lipped flowers; light sandy soil best.

-villosα. MONA-1. Pkt. 50e Pale lavender to light purple, growing well en hot, dry stony soils; intensely aromatic and ornamental as well, 6", HP

MORINDA (moh-RIN-dah)

Frees, shrubs and vines of Madder Family. They are tropical plants and car be grown only outdoors in the far South or as greenhouse specimen in the North. MORI-1. Pkt. 50e -betenocoides.

MUSCARI (mus-KAY-ry)

Grape Hyacinths. They are quite easily grown from seeds sown in the fall or spring; fully hardy and indifferent as to soil but not wet locations.

MUSC 1. Pkt. 50c A very curious species, 1 ft., stem-bearing widely spaced bel., the lowe-ones greenish-brown, the upper very small ourple. Later than most species. HBb.

MYOSOTIS (my-oh-SOH-tis)

For-Get-Me-Nots. They all prefer cool locations, partial shade and plenty of water in the soil, they are fine as edging plants and in boxes and baskets or bedding. In combination with Pansies of English Daisies, they make an effective display; also used in the rock garden or for ground cover in the rosery; while they are mostly perennials, they all need winter protection in the North where they can be carried over, Sow seeds early.

-alpestris, A. Fischer, MYOS-1, Pkt. 30c Very large flowered, deep blue, 8-in.
This is a hybrid and correctly listed as
Annamarie Fischer.

oblongata perfecta. MYOS-2. Pkt. 30c A fine winter flowering type, dark blue Royal Blue. MYOS-Dark blue, pretty, 12-inches. MYOS-3. Pkt. 15c MYOS-4. Pkt. 200

Gerda Seager. N Blooms 6-8 days earli MYOS-5. Pkt. 20c -Marga Sacher. lue, excellent pot plant for forcing.

-Mixed Myosotis. MYOS-9X. Pkt. 10c

All kinds mixed. MUSSAENDA

-glabra.

MUS-1. Pkt. 40c

NASTURTIUM

Tropaeolum (troh-PEE-oh-lum). Tender annuals not standing any frost, plant seeds in the open ground late in May or ey can he started indoors in pots or boxes; they do best in rather poor soil in a north exposure. In some localities the leaves and seed pods are pickled and sold as Indian Cress.

al8-in. tall, this is the most popular type -Orange Gleam. NAST-1. Pkt. 10c;

Deep glowing golden orange.
NAST-2. Pkt. 10c; -Rose Glow. oz. 30c; 1/4 lb. 80c Soft grengdine rose.

-Vermilion Glow. NAST-3. Pkt. 10c; oz. 30c; 1/4 lb. 80c Vivid scarlet, dark foliage.

NAST-4. Pkt. 10c;
NAST-4. Pkt. 10c; -Golden Gleam. oz. 30c; 1/4 lb. 80c

NAST-5. Pkt. 10c; oz. 20c; 1/4 lb. 80c -Mixed Gleam Hybrids. NAST-6X.
Pkt. 10c; oz. 30c; 1/4 lb. 80c

FLOWERS, 12 inches.

—Scarlet Emperor. NAST-7. Pkt. 10c; oz. 40c; 1/4 lb. 90c Dark foliage.

-Golden Rose Emperor. NAST-8 Pkt. 10c; oz. 40c; 1/4 lb. 90c Dark foliage. -Golden Globe.

oz. 40c; 1/4 lb. 90c Golden yellow flowers. -Mahogany Gem. NAST-12. Pkt. 10c:

NAST-9. Pkt. 10c:

oz. 40c; 1/4 lb. 90c Deep mahogany. ---Mixed Double. NAST-10X. Pkt. 10c;

or. 30; 1/4 lb. 90c -Tall Single Mixed. N.4ST-11. Pkt. 10c; oz. 30c; 1/4 lb. 90c 18 inches tall or 4 ft. trailer. Special

mixture.
—Single Dark Leaved Sorts. NAST-13.

Pkt. 10c; ox. 40c; ¼ lb. 90c

Dwarf plants with all dark leaves that are especially pretty in beds or boxes.

peregrinum. NAST-14. Pkt. 10c; oz. 35c Canary Bird Flower. Quick growing an nual climber having curiously cut yellow flewers with curved green spurs, the whole flower vaguely resembling canary birds in flight; good in any soil, 15 ft.

NEILLIA (NEEL-i-ah)

Asiatic deciduous shrubs very close to Spirea and belonging to Rose Family. Very graceful, of spreading habit with bright green leaves and small pink or white flowers in terminal clusters, fairly hardy and easily grown from seed.

of ivory, marked tyellow and violet.

MORE 4. Pkt. 25c

MORE 4. Pkt. 25c

MORE 4. Pkt. 25c

yellow, orange and red Snapdragon-lik flowers; start seeds indoors in March, se out late in May, spacing plants closely so as to support each other; fine for win dow boxes.

FOLLOWING ALL BELONG TO

Compact, lare with milk-white. large flowering turkey-red

—Fire King. NEME-2. Pkt. 15c
Dwarf compact variety, blood red
flowers.

NEME-3, Pkt. 15c -Triumph, Mixed. NEME-4. Pkt. 15c -suttoni, Mixed. Large flowers, more varied color range Orange King. NEME-5. Pkt. 15c Bright orange yellow, compact, large flowered.

Twilight.

Blue and white, compact, large NEME-6. Pkt. 15c Best Mixed. NEME-7X, Pkt. 15c 1/1 Jz. 75c

-suberbissima, gr. fl. NEME-8. Pkt. 20c Very choice mixture of dwarf plants.

NEMOPHILA (ne-MOF-i-lah)

Delicate annual plants, mostly natives of California. If seeds are sown early in the spring in a semi-shaded spot in the garden the small bright flowers will bloom continuously all summer.

-insignis, Blue, NEMO-1. Pkt. 10c; Baby Blue Eyes. Lovely sky-blue flowers, sun or partial shade, sow in position, early to flower; beautiful for edgings or rockery. 6".

-Mixed. NEMO-2. Pkt. 10c; 1/4 oz. 45c All sorts mixed.

NEPETA (NEP-e-tah)

Annuals and perennials with flowers in whorls of blue or white borne in spikes of clusters; many are used in medicinal pro-ducts as well as useful in the flower

A small blue flower with dark spots, perennial, sun or partial shade, ideal for the rock garden; the plant is covered with whitish down, 8", April-June, HP. (Ground

-rhaphanorhiza. NEPE-2. Pkt. 300

NICANDRA (ni-KAN-drah)

NICA-1. Pkt. 10c physalodes. An old fashioned annual with blue flowers and white centers, similar to Physalis but with more showy flowers; easily grown from seed. Called Shoo-fly or Fly-poison Plant, because of its ability to kill house flies if some of the crushed leaves and shoots are mixed with milk so that the flies can get to it, 3 ft.

NICOTIANA

(ni-koh-shy-AY-nah)

All are sensitive to frost, prefering light soil and warm sheltered situation. Start seeds indoors in March or in cold frame; in Kentucky the tobacco is sown in outdoor beds during March and protected with cotton covering, the seed is very fine and care should be used in planting it; set plants in the garden after the weather has become warm, the later parts of May. We offer, besides the flowering types of Nicotiana, most of the accredited varieties of field tobacco, especially as grown in Kentucky where the White Burley type r neld tobacco, especially as grov lentucky where the White Burley s grown

Sweet Scented White Tobacco. Pure white tuberose-scented flowers, bushy branching plants; plant in garden where the sweet scent will be enjoyed in the evening, 3 ft. affinis, White.

-- Red Hybrid. NICO-2. Pkt. 10c A French hybrid, flowers in bright red shades.

-Miniature, White. NICO-3. Pkt. 25c ery sweet scented, 1½ ft. tall, fine in beds. -sanderae, Crimson King.

Rich deep carmine, 21/2 ft. -Scharlachkonigin. NICO-5. Pkt. 10c

-sanderac, Hybrids. NICO-6, Pkt. 10c -sylvestris. NICO-7. Pkt. 10c Tall graceful plants topped with shower-like clusters of starry white flowers with long lender tubes which open in the day time, not fragrant.

NIEREMBERGIA

(nee-rem-BER-ja-ah)

Low growing half hardy perennials, usually treated as annuals flowering first year from indoor started seeds; require a warn, protected position especially at the start. They are fine for rock garden or borders and few plants are better for boxes or vases.

NIER-1. Pkt. 15c

Shrubby and branching with light lilaction flowers and yellow throats, 2-3 ft.

Creeping type, light lilac and brown center. NIER-2. Pkt. 15c

-hippimanica. NIER-3. Pkt. 25c Cup-like flowers $1\frac{1}{2}$ " across, lavender-blue, best in sandy soil and full sun. ----Purple Robe. NIER-4. Pkt. 25c

NIGELLIA (ny-JEL-ah)

Attractive hardy annuals, seed being sown as early in the spring as possible or even in the fall as small plants often survive the winter to bloom extra early in the spring. They are very useful as cut flowers or for the border.

-damascena, Miss Jekyll. NIGE-1. Pkt. 10c; ¼ oz. 30c

Double Cornflower blue, one of the prettiest old fashioned annuals, good for cutting or border, 1½ ft. Called "Love-in-a-Mist."

-hispanica. NIGE-2. Pkt. 10c; 1/4 oz. 40c Vardy annual, dark blue, 18 inches, attractive in mixed bouquets.

NOLANA (noh-LY-nah)

Trailing herbaceous perennials grown as annuals, with flowers resembling Morning Glories but having more substance; will thrive in hot dry sunny positions; useful in baskets or for border or rockery, sow seeds where they are to grow though they can be started indoors; combines well with Portulaca, requiring

he same treatment. -atriplicifolia gr. fl. alba. NOLA-1.

Pkt. 10c Trailing hardy annual with white owers, 6".

NOMOCHARIS

Extremely beautiful Lily relatives, suggesting miniature L. speciosum. They are almost unknown in this country and not much can be said about their culture. Seeds germinate irregularly, should be sown in a pot so that the soil can be transplanted without disturbing the seedings. Give Lily culture (B), grow in shade.

—pardanthina. NOMO-1. Pkt. 75c Lovely lily-like flowers, grow in shade; clowers pale rose-pink, 3 in. across, the nner petals spotted with violet, HB., 2 ft. NOMO-1. Pkt. 75c

NORDOSTACHYS

NORD-I. Pkt. 25c -iatamasi.

OENOTHERA (ee-noh-THEE-rah)

A large genus of annuals, biennials and perennials, divided into two groups, viz., Evening-primroses, which open late in the day and close towards morning, and the Sundrops, which open during the sunlight hours. The former open with a quick motion which can be seen and heard, they are among the best evening garden flower; flowers soft Poppy-like blooms on end of upright spikes. They require dry soil and full sunlight, very easily grown.

OENO-1. Pkt. 15c ght yellow, biennial grown as an annual.

Evening Scented Primrose, Yellow across, especially pretty in background plantings, 3 ft. OENC-2. Pkt. 15c

OENO-4X. Pkt. 10c -Mixed.

OPHIOPOGON (o-fe-o-PO-gon)

Turf-forming plants of the Lily Family, with racemes of small whitish flowers and grass-like foliage, often striped or spotted with white or yellow; useful for turf and border edgings, requiring no clipping; some rather tender in the N.

_intermedius. OPHI-1, Pkt. 50c OPHI-2. Pkt. 50c --clarkei.

ORNITHOGALUM

-odorata.

(aur-ni-THOG-ah-lum)

Bulbous plants of the Lily Family with lly-like flowers in clusters at top of leaf east stems. They are very pretty.

—caudatum. — ORNI-2. Pkt. 25c Caudatum. ORNI-2. Pkt. 25c Sea Onion. Popular house plant, has arge bulbs held above the soil. ORNI-2. Pkt. 25c

-sandersiae.

A splendid addition to the group of easily grown bulbs for the summer garden; handle like Gladiolus, seeds germinate quickly and strongly, making excellent cut flowers which rise from pretty rosettes of glossy, channeled leaves and on stems 3-6 ft. long at the end of which is a great flower cluster that opens successive buds over a long period; flowers large wax-like petals of creamy white about center boss of clive black, very decorative in garden. ORNI-1. Pkt. 25c

—sphacelata. OThA-1. Pkt. 15c
Rosy Wings. This is definitely one of
the better annuals of recent introduction
and especially good in dry seasons; easy
to grow, long blooming period, flowers
1" across and carried in clusters of many
flowers, each flower having a dense
double center enriched by wing-like 3lobed petals in a very pleasing silver

-corniculata purpurea. OXAL-1. Pkt. 20c VIOLA TRICOLOR: flowers, a perennial grown as an SWISS GIANTS OR ROGGLI TYPE

OXSYPHORA

paniculata tropica. OXSY-1. Pkt. 35c

OXYPETALUM

OXY. -1. Pkt. 20c An easily grown hardy annual that, when sown in April, blooms by the end of June and continues till end of October. Also make a pretty pot plant; flowers 1" across, star-shaped in many flowered sprays, color an unusual blue of silvery veiled pastel quality as if printed on each petal.

PAEONIA

Peony. Only recently has interest developed in the various wild species many of which flower weeks before the border varieties, and make possible two months of peony bloom. The species are all single flowered, with varied and highly armounted leaves, and of colors unknown in the border varieties, including pure yellow and bright scarlet. They are also very valuable for hybridizing and many new forms have been developed recently by crossing the species.

Peony seeds require a full year, in most cases, before the plant appears above ground. During the first season root growth only is made, but with the first warm days of the following spring, fair sized true leaves appear. Growth for the first season or two is rather slow, but later the plants develop rapidly. Three or more years are required to reach flowering size. Sowings may be made in an open ground bed in spring and no attention is required except to keep the bed free from weeds.

The only peony native to N. Am., with ather small flowers or red-brown and relicw, effective and unusual. It is small mough for the rock garden and presents

The earliest flowering of all Peonies and one of the quickest and most vigorous from seed. It blooms a full month before the border varieties, with crinkled flowers 4 inches across, of pink or rose and rarely soft yellow. The leaves are very large and handsome, tinted brown in early stages of growth. The seed-pods are also highly ornamental, lined with rich red, while the seeds themselves are cobalt blue; apparently a true species, of unknown origin.

-emodi. -lutaa, Sherriff's Var. PEON-8: Pkt. 60c Seeds are 20c each. A magnificent form, rowing 5-6 ft., rich golden yellow flowers; till very rare in cultivation and will be avaluable in hybridizing.

PEON-5, Pkt. 75c A rare species with hondsome scarlet lowers, 3 ft., HP.

PEON-6. Pkt. 50c -mlokosiewitschii. The only truly yellow herbaceous peony with pale yellow flowers, 4 in across, single. Hardy and does well, in acid, well drained soils, full sun, 2 ft., HP.

—species mixed. PEON-2. Pkt. 75c
From a large collection of European and Asiatic species. The color range is from blush and pale yellow to deep red, with many intermediate shades. The mixture is probably strongest in P. woodwardii which makes a dense mound of fern-like leaves, over which are borne in profusion rather flat flowers, 3 inches or more across, of varying shades of pink. Included also are P. lobata with tulip-like flowers of intense scarlet, the most brilliant color known in Peonies; multicolored P. chamaeleon, including yellow flowered and numerous others. These will flower for weeks before the herbaceous border sorts begin to bloom and offer a wealth of color for border and cutting, HP, 2-3 ft. species mixed. PEON-2, Pkt. 75c OENO-3. Pkt. 15c

One of the loveliest Peony species, having ferry foliage and a profusion of rather flat Dahlia-like flowers in pink shades, early, easy, 2 ft., HP.

PANCRATUM

(pan-KRAY-shi-um)

Peruvian Daffodil. Interesting white or reen flowered bulbous plants of Amarilis Family. They are not hardy in the N.

—illyricum.

PANK-1. Pkt. 25c The hardiest species, useful for summer ploom in mild climates, flowers borne in clusters, pure white and deliciously fragrant, grow in pots in colder sections, 15".

PANICUM (PAN-i-kum)

Large genus of annuals and perennials of the Grass Family, a few being of value as ornamentals.

-capillare. PAN:-1. Pkt. 10c
Witch grass, grown for drying when
they are mixed in bouquets; annual, 2 ft.

PANSY

Contive in garden.

OSBECKIA (os-BEK-i-ah)

Little kown plants of the order of Melastomaceae, ranging from herbs to evergreen shrubs; the flowers, with five obovate petals, are showy and borne in heads or panacles. While quite tender, they may be grown in the house or greenhouse during the winter and plunged outdoors in summer, best in light shade.

—White.

OSBE-1. Pkt. 35c

OTHAKE

OTHA-1. Pkt. 15c

Rosy Wings. This is definitely one of the better annuals of recent introduction and especially good in dry seasons; easy to grow, long blooming period, flowers l'a cross and carried in clusters of many flowers, each flower having a dense double center enriched by wing-like 3-lobed petals in a very pleasing silver

OXALIS (OK-sah-lis)

Small delicate plants, some useful in the rock garden, for bedding, hanging baskets and in the greenhouse. Usually best to start them in the spring, requiring an acid soil of a porous mixture of leaf mold, loam and cand; liquid mamure if applied near maturity will encourage flower production.

—corniculata purpurea. OXAL-1. Pkt. 20c

The purple leaved bedding Oxalis with yellow flowers, a perenning grown as a mixture of leaf mold, loam cand cand; liquid mamure if applied near maturity will encourage flower production.

We give particular attention to the strains and varieties we offer in Pansies and carefully check every source, and also from the results obtainable. Thousand varieties we offer in Pansies and carefully check every source, and also from the results obtainable. Thousand varieties we offer in Pansies and carefully check every source, and also from the results obtainable. Thousand the country. In every case we supply the very best obtainable. Those ordering and carefully check every source, and also from the results obtainable. Those ordering are grown as a form the results obtainable. Those ordering are grown as a form the results obtained by our customers, all over the cyp best obtainable. Those ordering and carefully check every source, and also from the results obtain We give particular attention

This is a very popular type, the plants are robust and the flowers very large with a full color range. Height about 6 inches. -Alpenglow. PANS-1. Pkt. 25c;

Mammoth scarlet flowers. —Alpenlied. PANS-24. Pkt. 35c
A new Heinemann with dark mahogany flakes; this is especially recommended. (Small quantity of seed available).

-Claret. PANS-2. Pkt. 25c; 1/4 oz. \$1.25 A beautiful wine-red -Flame, PANS-3. Pkt. 25c; 1/4 oz. \$1.25

-Mont Blonc. Pure white.

-Rheingold. PANS-5: Pkt. 25c:

34 oz. \$2.50

Deep golden yellow with dark blotches n lower three petals. -White Beauty. PANS-7. Pkt. 25c:

Free flowering pure white. -Yellow Master. PANS-8. Pkt. 25c:

1/4 oz. \$2.00 Pure golden yellow.

-Best Holland Mixed. PANS-9. Pkt. 25c; This is the best strain of one of the larger growers in the Netherlands and thould be good.

-Ullswater. PANS-6. Pkt. 25c; 1/4 oz. \$1.50 (Lake of Thun). Marine-blue with darker blotch showing through, very pretty.

-W-F Special Blend.

Pkt. 25c: 14 oz. \$1.25
This strain of Swiss Giants is from one of our best growers and is characterized by a predominance of rich wine colored flowers which far surpasses, in form and

range of dark rich colors any blend of Swiss Giants, we have seen. Plants are uniformly compact and most of the blooms are waved, giving them the appearance of being frilled.

-Super Swiss Giants. PANS-12

An improved California strain with enormous flowers of fine texture and form coming in a remarkably fine color range and especially well marked, many being beautifully ruffled and curled; long stems and sturdy plants are characteristic of this particular strain.

-Dwarf Swiss Giants. PANS-13. Pkt. 25c; 1/4 oz. \$3.00

A very dwarf compact new strain, extra early flowering in complete color range running to brighter colors.

VARIOUS STRAINS OF PANSIES:

-America Blend. PANS-14. Pkt. 25c; 1/4 oz. \$3.00 An extremely bright blend, early flower ing and dwarf with α good color range plants sturdy, flowers large.

-Coronation Gold. PANS-15, Pkt. 25c; Giant golden yellow blooms, this is a specialty with one of our European growers and is considered very high class, with out blotches or markings.

-Engleman's Giants. PANS-16. Pkt. 35c; 1/4 oz. \$4.00

An early giant flowered strain on compact plants; flowers average 4" across and coming in a beautiful color range containing both light and dark shades with a good percentage of bronze and reds; never solid colors as each flower has a lighter tone around the edges of each petal.

-Maple Leaf Giants. Pkt. 25c; 1/4 oz. \$3.25

A fine large flowered strain of good shape and substance, plants compact yet husky growers having a luxuriant dark green foliage and large leaves; color range both light and dark with rich dark velvety tones.

-Masterpiece. PANS-18. Pkt. 25c Dainty ruffled and frilled flowers, colors rich in red and brown shades, compact plants excellent for borders.

---Orchid-flowered. PANS-19. Pkt. 25c: 1/4 ox. \$1.50 Medium sized flowers, beautifully waved and curled and in a wonderful color range, an European grown strain.

PANS-20. -Scottish Exhibition. Pkt. 35c; 1/4 oz. \$3.00 Symetrical strain of plants bearing 4' flowers of perfect form and substance; in a multitude of new and varied color com-

-Schreiber's Black. PANS.-27. Pkt. 50c

—Schreiber's Red. PANS.-25. Pkt. 50c
A beautiful red color in this famous strain of German Pansies.

-Schreiber's White. PANS.-26. Pkt. 50c Schreiber's Mixed. PANS.-28. Pkt. 50c

three varieties.

bine triuming to intense, heavily blotched flowers which are of circular outline with overlapping petals carried well above the foliage on stout stems. -Florist or Market Strain. PANS-21

Pkt. 25c; oz. \$4.75 An European grown strain of the highes quality and especially offered to plan growers. Extra choice.

-trimardeau. PANS-22. Pkt. 20c

Brilliant mixture, extra choice and especially recommended where color effect is most prized in beds, border or edging. Plants are compact and especially free blooming, neat habit, very hardy; excellent blend in brilliant colors with some blotches, showy in mass planting.

PANS-23. Pkt. 25c Mixed, this type is the winter-flowering Pansy, in type like the Trimardeau bu

TUFTED PANSIES: See Viola Cornuta.

PARIS

Related to Trillium, but with smaller flowers and needing the same conditions of rather open woodland. Its flowers are normally green and the plant is more curious than showy.

—palyphylla.

PARIS-1. Pkt. 50c.

A very striking plant 20-50 inches high with dark green leaves up to 6 inches long; the flowers are very large, the outer segments narrow and dark olive green, 4-5 inches long, the inner segments slightly shorter and yellowish green followed by a very large yellow or rust-colored berry; hardiness uncertain in the North.

PARKINSONIA

(pahr-kin-SOH-ni-ah)

Tropical or sub-tropical trees and shrubs of Pea Family.

-aculeata. Jerusalem-thorn or Ratama. Small thorny evergreen tree with feathery pendulous branches and loose clusters of fragrant yellow flowers; a fine hedge plant in far South standing dry conditions; easy from seed. Seed from Texas.

PARNASSIA (par-NAS-i-ah)

Belonging to the Saxifrage Family, these plants have smooth, mostly basal leaves and five-petaled flowers of white; like wet places and are much beloved by wild-garden enthusiasts.

—nubicola. PARN-1. Pkt. 30c One of the best, with inch-wide white flowers and rather broad leaves, heart-shaped at the base; about 1 ft. high. PARN-1. Pkt. 30c

PARN-2. Pkt. 30c Seed collected in Alaska and found wet places and swamps.

PEDICULARIS |

(pe-dik-eu-LAY ris)

Waod-betony, Lousewort Annual and perennial plants of Figwort Family. Flowers 2-lipped, spiked clusters in whitish or reddish colors. They are fine wild garden flowers.

PEDI-2. Pkt. 25c One of the most brilliant, with foothigh spikes of scarlet flowers. Perhaps somewhat parasitic and seed should be sown in open woodland in well drained locations, 1 ft., HP. Very choice and rare.

phonantha.

PEDI-3. Pkt. 25c autiful leaves and pink flowers for

PEDI-2. Pkt. 50c -groenlandica. PEDI-1. Pkt. 25c Flowers are elephant heads, trunk, ears and all. Grows in wet places, 12-18-in. tall,

PENSTEMONS

A genus of perennial plants, both hereceous and shrubby of the Figwort Family, all native of N. American and called Beardstongue.

Penstemons bloom in spring, some early and some late. They are mostly in the blue and purple range, with a few reds, but no good yellow or orange. They come in all heights and types of growth, suitable for almost any location. They are very floriferous and are lovely when the appropriate species are selected and grown happily; are likely to be disappointing when not happy or not suited to the location. They require no special type of soil, but certain fussy species will be short-lived unless the soil is very porous. Some kinds will do well only in rock gardens, others are more appropriate to the perennial border.

Penstemons bloom so heavily that they

rete to the perennial border.

Penstemons bloom so heavily that they often exhaust themselves and die. They may usually be saved if the flower stalks are cut off after blooming, water well, and give a little plant food. Bone meal applied twice a year will help, and perhaps a very little complete fertilizer just after blooming. The idea is to induce new growth from the crown to replace the old flowering stalks.

flowering stalks.

In spite of the best of care, it is just the nature of Penstemons for a certain percentage of each planting to die each year for no apparent reason. The easiest way to offset this inconvenience is to have from plants than you need and thus not have to worry if some of them die. It is best to raise them from seed, which is not a difficult operation, and to set out twice as many seedlings as the space will hold. Natural losses will thin them out. The seeds germinate well if planted out-

A floriferous and showy species with slender leafy stems, flowers large deep blue in tight clusters. The best of the cluster-heads, 1-ft. tall.

PENS-79*, Pkt. 756 alamosensis. A very rare species from southern N. Mex. which will be tender in the N. Rather tubular red flowers and glossy green leaves; for steep sunny banks, HHP, 2 ft.

PENS-5. Pkt. 40c Alpine appearing species with a dense basal rosette of small green leaves and dense spikes of flowers, 8-12" high, in bright blue. A choice rock plant, one of the best in the Proceri Section; requires stony soil.

PENS-6*. Pkt. 20c Glaucous blue entire leaves, stem 1 ft. or so with blue flowers, also listed as P

-quriberbis. PENS-56*. Pkt. 50c Nect little alpine appearing rock plan with many stems and enough flowers to become quite showy. Resembles P. angustiolius. Flowers 4/4-in. long, pale lilac to purplish blue with golden beard, 4-8-in all

PENS-88. Pkt. 50c The name is perhaps not valid but if covers one of the finest of the shrubby species, with rosy-purple flowers, glaucous foliage, hardy shrub, I ft.

—bicolor, typicus.
Yellow form, jagged bluish leaves, tall stems, 3 ft., with large flowers; seed was from an entirely light yellow stand.

-bicolor, ssp. roseus. PENS-2*. Pkt. 50c A very rare Arizona form with rose purple flowers.

—brandegii. PENS-3*. Pkt. 35c A garden favorite easily grown, 2-3 ft. high, with large bells of clear pure azure-blue, flowers, very free flowering, very

—bridgesii. PENS-4*. Pkt. 35c Sub-shrubby forming mats to 2 ft. across md 1 ft. or more high, flowers over a ong season, intense scarlet tubular lowers with reflexed lower lip, it makes fine rock garden plant, very hardy.

One of the finest shrubby species with after broad evergreen leaves and a great rofusion of short spikes set with large urple snapdragons, Hardy but needs overing to protect it from winter winds. It., HP. PENS-84*. Pkt. 25c

-caudatus. PENS-60*, Pkt. 30c

PENS-7*. Pkt. 50c A great rarity in nature introduced by Mrs. J. Norman Henry; toothed glaucous blush leaves and widely inflated flowers of rose with a touch of orange; many branched, 3 ft., found growing only in volcanic cinders. This is a gem for the border or large rock garden, hardy in East.

PENS-63*. Pkt. 30c -comarrhenus. PENS-8*. Pkt. 45c nue, the penicles opening so that each of the very large flowers stand out beautifully by itself. "One of the most lovely species," for border or large rockery.

A tall and rather leafy species for the rougher places in the border or for the wild garden. The quite large flowers in open clusters vary from pink to magenta, HP, 3 ft. -canescens. PENS-76*. Pkt. 50c

—cobaea purpureus (Ozark Strain).

PENS-83*. Pkt. 50c
One of the showiest and most popular
of all Penstemons, with very large and
swollen flowers of rich violet-purple. Fine
for the sunny border, especially in the
Midwest, where it is being grown with
great success; much better than ordinary
P. cobaea, HP, 3 ft.

Concinnus. PENS-80°. Pkt. \$1.50

One of the rarest of all Penstemons, which had been found only once before our collectors procured seed in a little-known region of western Utah; rosettes of narrow, strap-shaped dull green leaves, finely hairy, and short stems bearing only 2.4 flowers of pale blue-purple, half an inch long. From desert mountains and should be grown in a dry sunny rock garden, HP, 3 inches.

West and East but will survive with some protection. The plants are more or less shrubby and vary from 1-5 ft. high with narrow leaves of various colors. The moderate-sized flowers, in loose sprays, are produced over a long season and vary in color from rose-violet to intense pure blue. Best grown in full sun with every sharp drainage, in a sheltered position in the border, HP, 1-5 ft.

Selected Blues. PENS-85°. Pkt. 30c

Closely related to P. utathensis but a smaller plant, with quite narrow bluegreen leaves and tubular flowers of most unusual shades of rose and lavender. For the sunny rock garden, preferably in very stony soil, HP, 6-12 inches.

-congestus. PENS-59*. Pkt. 35c PENS-90. Pkt. 30c -cyananthus. PENS-9*. Pkt. 75c

This has also 3 subspecies. Intense blue flowers in clusters, rather long stems, green leaves, 2 ft. tall.

doors in late fall; spring planting is apt to be less certain, often nothing more is necessary than to scatter seed around the parent plants each fall and let the self-sown seedlings renew the old plants. Penstemons can also be increased by cutting taken at almost any time during the growing season.

AMERICAN PENSTEMON SOCIETY

AMERICAN PENSTEMON SOCIETY

The American Penstemon Society is cargaged in research right now to discover which are the best species for different locations and what are the best methods of growing them. There are about 235 species of penstemons, all native to aur own country, many of them as lovely as the best flowers from foreign lands. Very little is known generally about them. Experimenting with them is an adventure for gardeners with the pioneering instinct who wish to try something new and unknown. Information about membership can be secured by addressing a postcard to the secretary, Ralph W. Bennett, 5607 North 22nd street, Arlington, Virginiat.

The information brought forth by the Society is published in its bulletins.

Annual dues are \$1.00, Amel Priest, Peru, Jowa, treasurer.

NOTE: We believe we are headquarters for Penstemon Seed. All offerings are carefully certified. Those marked with an (*) after the symbol, viz. PENS-1* represents seeds secured from sources checked by the American Penstemon Society and can be relied upon to be true to their classification. We will be pleased to have anyone growing especially fine hybrids to contact us. There is a large and interesting field here for hybridization. to contact us. There is a large an teresting field here for hybridization

PENS-57°. Pkt. 40c flowers, 3/4" long. A rarity.

PENS-11*. Pkt. 25c -digitalis. PENS-67*. Pkt. 75c A rare low growing species for the sunny rock garden; rosettes of narrow dusty green leaves and short spikes of inch-long blue-purple tubes; will standmuch drought, HP, 6 inches. rare low

-eatoni, ssp. exsertus. PENS-12° Pkt. 35c

Extremely showy species, large leaved and erect growth with the large stems bearing long open spikes covered with red flowers. This sub-species is taller than type, to 4 ft. with anthers exserted from corolla.

-eatoni, ssp. lancefolius. PENS-13° Pkt. 40c Nevada form having narrow stem

-eatoni, ssp. undosus. PENS-14*. 2kt 30c A form with downy stems and big basal leaves, and the usual pendant tubes of sealing-wax red, HP, 2-3 ft.

eriantherus, ssp. saliens. PENS-15* Pkt. 25c

Flat rosettes composed of a great many narrow dull green leaves and short stems, bearing very large lavender flowers, somewhat variable in shade; a fine rock, plant, quite easy in the East if grown in well-drained sandy soil in full sun, HP, 1 ft.

PENS-72*. Pkt. 75c The flowers are blue, flushed pink outside, rather narrow with widely spreading lobes; the leaves are gray-green, broad, somewhat heart-shaped. For rather dry sunny places in the rock garden or steep banks; it may be slightly tender in the N. as it comes from Texas and N. Mex., HHP, 1 ft.

PENS-16*. Pkt. 40c A neat looking alpine appearing medium tall species with small green leaves and small yellowish white to creamy yellow flowers in abundant clusters; a soft color, going well with the blue types, easy to grow.

A tall plant with conspicuous grayish sharply toothed glaucous leaves and long showy flower spikes on stout stems. Flowers are large, inflated, rose pink, to the tall. PENS-17*. Pkt. 25c

PENS-18*. Pkt. 30c -fruticosus. Woody shrub. Flowers blue, 2-ft. tall,

-garrettae. PENS-19*, Pkt. 50c Rather low with several erect stems 8-16" high with a few tiny green leaves and quite large deep blue flowers on narrow spikes, very desirable for small rock garden.

PENS-21*, Pkt. 35c Procumbent habit, fine purple blue, early and hardy, l-ft., best in coarse soil. There is a sky-blue strain which we may be able to offer next year.

-gloxinioides, Sensation. PKt. 3UC

PENS-22*. Pkt. 35c Very popular and showy; stout glau-cous leaves and stems to 6 ft., carrying unmerous large lavender blue flowers, ine border plant, very hardy.

-grandiflorus, ssp. albus. PENS-23* Comes about 50% true white flowers

but the white flower is all white, no lavender, a sport from the type. -- Lavender Form. Pkt. 50c

heterophyllus. PENS-77*. Pkt. 75c A showy and very variable species from California, not reliably hardy in the Mid-vest and East but will survive with some

-- Pale Azure-blue Selections. PENS-86*. Pkt. 30c Choice selected plants of this variety.

-hirsutus, Improved. PENS-24*. Pkt. 35c An easy eastern species, with rather large leaves and a profusion of moderate-sized flowers. The color is usually rather poor, but in this selection only good colors will appear, pink to purple, HP, 2 ft. -jamesii. PENS-25*. Pkt. 50c

— Jamesii.

An alpine-appearing plant of very near habit, the large clump of grayish leaves being attractive and the flower large quite densly packed and numerous expugh. Flowers soft color, blue-lavender.

A rare species of the glabri and confined to one mountain range, dark green foliage, to 3 ft. flowers deep pure blue, profuse bloomer and should be easy to PENS-28*. Pkt. 80c

An attractive little plant of somewhat alpine appearance but with no conspicuous basal rosette; its slender stems leafy and floriferous with spikes of blue flowers, extremely rare in nature.

-linarioides, ssp. coloradoensis.

PENS-82*. Pkt. 50c
A tiny shrub with long narrow silvered leaves and small lavender flowers. Quite easy in the rock garden, in sun, and attractive at all seasons, HP, 6 inches.

-microphyllus. PENS-31*. Pkt. 40c A much branched strub to 4 ft. high and across, with tiny green leaves, each branch ending in a 6" spike of bright yellow flowers about 3/4" long, may not be hardy in far N.

PENS-70". Pkt. 75c -miser. 1: 2-fo Low growing, with tufts of dirty green leaves and short spikes of flowers very variable in size and either dusty pink or blue-purple in color. For dry sunny locations in the rock garden, HP, 6 inches. -montanus. PENS-68*. Pkt. 75c

One of the very few very truly alpine species, growing on stone slides at high altitudes. Forms woody mats from which rise short stems with light green deeply toothed leaves and tipped with clusters of enormous clear lavender trumpets. One of the most showy dwarf species, for took garden in full sun, likes lime, HP, 8 inches.

murrayanus. PENS-78*. Pkt. 75c
A tall species with very large and wideopen scarlet flowers. Very showy for the
border, preferring sandy soil; should have
some protection in very cold climates,
HHP, 3-4 ft.

PENS-71*. Pkt. 75c -neomexicanus. Quite long spikes of rather bell-shaped flowers, of varying shades of blue and narrow green leaves; from the mountains of southern New Mexico where it grows in sunny meadows. Tall enough for the front of the perennial border or fine for a sunny bank, HP, 2 ft.

ovatus.

PENS-73*. Pkt. 35c
One of the easiest and most popular species for the border, satisfied with almost anything except deep shade. Long spikes of good-sized flowers of rather slaty blue, above handsome rosettes of large glossy dark green leaves. One of the best species for the beginner, HP. 2-3 ft. PENS-73*. Pkt. 35c

PENS-33*. Pkt. 50c —palmerii. PENS-33*. Pkt. 50c
The large sharply toothed leaves are
conspicuous from a distance; the flowers
are among the largest in the genus and
always plentiful; a very showy plant and
much praised. Flowers are similar in
shape to those of the Catalpa, an inch
or more across, broad and flaring, whitish,
flushed more or less with pink and some
a rich deep pink.

-palmerii, White Form. PENS-34* A pretty white form of the species with a pink flush at base and purple guide lines.

–palmerii, ssp. eglandulosus.PENS-35*. Pkt. 40c

Plants much broader with many stems which are thinner than those of the type and with smaller capsules.

mind with smaller capsules.

—pinifolius. PENS-81*. Pkt. 75c

A newly introduced species that has ong been coveted by ardent rock gardeners. From the woody base arise short stems set with very short and narrow ight green leaves, above which are narrow trumpets, scarlet with yellow throat, and with long reflexed lower lip. From nountains near Mexican border, but persectly hardy and easy in the East. Will olerate light shade and likes some sand in the soil; a great treasure in a sunny rock garden, HP, 6-9 inches.

PENS-36*. Pkt. 75c Sub-shrubby, a very attractive, alpine ppearing showy little plant with a mat i little leaves at base and numerous rect stems about 12" high, each with a rell packed prominent spike of blue owers; desirable in every way for the nall or medium rock garden.

PENS-37*. Pkt. 25c Native Montana species, blue flowers, 10-18 inches tall, June-July.

-pseudospectabilis, ssp. connatifolius. PENS-38*. Pkt. 50c.
Thin bright green leaves, finely toothed, corolla pink to rose and rather narrow, quite showy.

-rattani : inor. PENS-91. Pkt. 50c richardsoni. PENS-87*. Pkt. 30c One of the easier species, with deeply lobed leaves and short but rather broad flowers ranging in color from pink and bluish to rose-lilac. Hardy and a good one for the beginner, \(\frac{1}{2}\)-2\frac{1}{2} ft., HP.

Trubicundus. PENS-40°. Pkt. 60c
A very attractive species with unusual lovely color of rose with a touch of blue, showy for the wild garden or for the border, stands some shade. Not α common species, 4 ft.

PENN-1. Pkt. 15c;

4 oz. 35c
very narrow leaves, 2 ft. long; this is and rose, 4 ft. tall.

—villosum (longistylum).

-secundiflorus. PENS-42*. Pkt. 30c Very showy graceful plant of medium height making a clump of small bluish green leaves, several wavy stems, leafy on lower half and numerous large green leaves, several wavy stems, leafy on lower half and numerous large lavender flowers; desirable for either rock garden or border.

-secundiflorus, spp. lavendulus. PENS-43°. Pkt. 25c Has glaucous blue leaves and blue flowers, otherwise like the type.

-sepaluius. PENS-44*. Pkt. 50c Very narrow gray leaves on thin stems much branched sub-shrub to 3 ft. with quite large and inflated violet flowers; ery showy.

PENS-45*. Pkt. 50c

-speciosus.

Very showy member of the Glabri with nusually large blue flowers on stems 2 ft., not too tall for the small rock arden or too low for the front -strictus. PENS-46*. Pkt. 25c

Very showy species with narrow leaves, tems bearing densely packed spikes of deep blue flowers, slender but strong tems, delicate looking but heavily flowered, 1½-2 fw, for border or large rock arden. PENS-47*. Pkt. 50c -subglaber.

Quite similar to P. glaber, very showy very floriferous, large deep blue flowers packed on quite long spikes; very lovely and ornamental species. -triflorus, ssp. integrifolius. PENS-48° triflorus. PENS-58. Pkt. 25c

This has also 3 subspecies. Intense plue lowers in clusters, rather long stems, reen leaves, 2 fit tall.

— deustus.

— PENS-10*. Pkt. 60c

This also has 3 subspecies. A neat and thractive and the flower large, guite density packed and numerous thractive rock garden plant of fine habit, to ensure the carry packed and numerous on small for the border, forming mate in the part quantities of stems of the across with great quantities of stems of the process of the control of the process of the process of the control of the process of the proces

PENS-30°. Pkt. 60c | rather rare species as yet. Highly recom-

-triphyllus, spp., diphyllus. PENS-49°. Pkt. 40c

Rather low growing, with stems semi-prostrate; rather small toothed leaves. Flowers are rather short, but quite broad and rich blue-purple; not one of the show-iest species but very attractive in the rock garden, HP, to 1 ft.

-unilateralis. PENS-50*. Pkt. 25c Tall, lavender flowers more or less dis-inct veining in throat; not difficult to grow and very pretty in the garden. A avorite.

PENS-69*, Pkt. 75c -utahensis. utchensis. PENS-69. Pkt. 75c Inch-long rather narrow tubes of cherry-red above loose rosettes of rather narrow blue-gray leaves; out of flower, the plant looks much like P. angustifolius. For stony sunny slopes; may need slight protection in cold winters. This is the true species, the name often appears in catalogs, misapplied to dull and undesirable species, HP, 1-2 ft.

PENS-74*. Pkt. 75c -watsoni. Makes a fair-sized tutt of many thin and graceful stems, with a profusion of small flowers of light to deep blue. An easy species for the rock garden in sun or light shade and will thrive under poplar trees, HP 1 ft. -whippleanus.

The flowers in our particular aftering are hooded and of sombre black-purple or sometimes greenish-yellow; the leaves small, dark green and in prominent rosettes nent rosettes of small dark green leaves; medium height and very floriferous. The species is quite variable in color and some may be disappointing.

Open panicles to 2 ft., clear blue, med-ium sized flowers. Likes drainage as do nost Penstemons and given this they will grow on fairly moist slope in sun or part

Fairly large growing but desirable, best in shady, wild garden, flowers blue, 1-3-ft., May-June.

-Saier's Blend of Species. PENS-53°. This is a mixture of every species Into is a mixture of every species and sub-species we have in stock and including many unlisted ones, that we do not have enough of to offer separately. This is a rare and yaluable collection of Penstemons. They should, of course, be grown in a nursery row until you can tell just what they are.

-Small Flowered Varieties Mixed. PENS-54, Pkt. 35c

PAROCHETUS (pa-roh-KEE-tus)

Shampock-pea. Also known as Blue-oxalis. Low growing creeper of the Pea Family with cobalt-blue flowers with pink wings; they are a very useful and popular pot plant for hanging baskets and flower the whole year. They do best in mixture of sand and humus in a semi-shaded place; in the North they are not real hardy; they also are fine in the rock garden. PARO-1. Pkt. 35c

PELARGONIUM

(per-ahr-GON-ni-um)

The genus to which the common Geranium belongs. It is quite distinct but related to the genus Geranium. The common house Geranium is listed under P. zonale. They do well in any good soil and many do well in naturalizing. The seed can be sown early, either indoor or out and the plants grown on in the usual way. Raising the various Pelargonium and Geranium plants is very popular but to actually grow them from seed with the added interest of developing new varieties yourself, is very interesting.

—zonale, Mixed.

PELA-2. Pkt. 20c

—zonale, Mixed. PELA-2. Pkt. 20c
An European strain of the common
Geranium (jee-RAY-ni-um) saved from a
special collection of prized plants. The
growing of Geraniums from seed being a
very interesting pass time and many different kinds, colors and types resulting in
interesting finds. Best grown in pots from
the transplanting stage from seedlings and
the pots plunged in coarse soil during the
summer months, when the pots can then
be taken indoors during the winter
months for growth through the winter.

PENNISETUM (pen-i-SEE-tum)

A genus of ornamental grasses both annual and perennial; making the most beautiful plants for border or for specimens in the lawn as well as for effect in bouquets or for drying for winter use. Start seeds indoors in March growing the seedlings on in small pots if possible; give plenty of room and allow 12"-18" apart in the garden.

-ruppelianum. PENN-1. Pkt. 15c;

Pkt. 10c; ¼ oz. 20c
Short leaves and 4" purplish spikes at
end of 2 ft. stems. The long feathery
bristles give a plume-like effect. While
a perennial it should be grown in N. as
an annual. Hardier than most species
and a very pretty grass for the sunny
border.

PERILLA (pe-RIL-ah)

Half hardy annuals valued for their highly colored foliage and used in summer bedding and sub-tropical effects; thrive in any light loamy soil; start seeds in March indoors in gentle heat, harden off and set out late in May; native

-frutescens crispa. PERI-1. Pkt. 15c Easily grown annual especially valued for the rich color effect of its foliage, deep mayon with bronze metallic sheen, the margins curled, crisped and undulated; used much as one would Coleus but it is much quicker in growth and easier grown; sow seeds in position or start indoors, 4 ft.

—nankinensis.

PERI-2. Pkt. 15c

Half hardy annual, deep purple foliage, very popular bedding plant.

-laciniata. PERI-3. Pkt. 15c Pretty laciniated foliage giving it effective appearance.

PHACELIA (fa-SEE-li-ah)

Hardy annuals, mostly lavender, violet or blue flowers in clusters or in racemes, charming in mass plantings; sow where plants are to grow or they can be started indoors for early bloom.

PHAC-1. Pkt. 10c

PHAC-2, Pkt. 20c

PHI:OGACANTHUS

(flo-ga-CAN-trus)

Somewhat shrubby plants with spikes of attractive flowers, related to Acanthus. They are best grown in the greenhouse, requiring a rather warm, damp atmosphere and soil rich in humus. The flowers are tubular, two-lipped, rather long and broad.

PHLK-1, Pkt. 30c A moderate-sized shrub, with narrow Family, bearing red and yellow spotted

PETINIA

There is hardly any other flower that ill give so much bloom with as little are as will the Petunias; in the hot sum-iers, their bloom is continuous. Their se is confined to porch boxes and baskets has for bedding. They do not do well in

chief pitfall the amateur runs

—Double Giants of California. PET-1 An improved Shepherd Strain with immense blooms typical of this strain, magnificent color range and high double percentage.

-Ruffled Monsters, Giants of California

Light and dark shades make up this high class blend, deeply ruffled and artistically veined, flowers 5"-7" across and almost look as if double.

-Dwarf Giants of Californial, Rosie Rich rose, shading deeper in throat, very compact and large flowered, a perfect florist variety for pots and boxes.

-Dwarf Giants of California, Deep Rose A very pretty deep rose shade with mammoth flowers, ruffled and beautifully penciled.

-Dwart Giants of Calif., Ramona Strain

PET-5. Pkt. 35c Habit is dwarf and compact; colors are hand blended; flowers ruffled and fringed and suitable for the most critical.

-Giants of Calif., Salmon Rose Shades PET-6. Pkt. 500

This is a special mixture for the Florist trade and contains only the choicest salmon-rose colored plants; its blooms are exceptionally large, averaging 5-6 inches, with shallow open throats; flowers freely produced on sturdy plants and all have beautiful veined markings on their open throats. -Giants of California, Mixed. PET-9.

Pkt. 35c; 1/32 o: \$3.50

Well balanced blend of light and dark shades, fringed and ruffled, with attractive deep throats, many beautiful veined; the first picking from the choicest plants. For bedding or boxes.

—gr. fl. Flutty Ruffles.

PET-8.

Pkt. 35c; 1/32 oz. \$2.25 Pkt. 35c: 1/32 oz. \$2.25

A delightful blend, containing numerous shades of veined and bicolor pink and rose combinations not found in the separate color varieties; all flowers are finely fringed and so heavily ruffled that they appear double; by far the finest choice Petunia for the home garden and a prime favorite with the florist.

-Giants of Californial, Florist Strain. PET-7. Pkt. 50c; 1/32 oz. \$4.00

Supreme Florist Strain in extremely large flowers, in shades of rose, pink salmon, copper and other delightful sof pastel tints.

-Giants of Californial Bes: Mixed. PET-10. Pkt. 35c; 1/32 oz. \$3.50

A blend of the largest and choicest colors especially for the Florist trade; hand blended from the best varieties by one of our largest Petunia growers. gr. 1. Single Mixed. PET-11. Pkt. 25c; 1/32 oz. \$1.10

The large flowering type with plain edges, 12" tall, and making the most attractive showing in beds, boxes or baskets. The blend is the very best.

HYBRID NANA COMPACTA

VARIETIES:
These grow 12" tall, the plants are compact and upright and make the best plants for beds where a uniform shape is wanted with an abundance of flowers the whole summer and fall.

PET-12. Pkt. 20c; -Blue Violet. 1/s oz. 50c A shade deeper than Periwinkle and several tones lighter than Violacea, the most beautiful dark violet.

-Celestial Rose, Reselected. Pkt. 25c; 1/8 ox. 70c Deep rose, very compact, in an improved habit and much larger flowers.

—Glow. PET-14. Pkt. 25c; 1/8 oz. 75c A beautiful bright carmine-red. -Rose of Heaven, Improved. PET-15. Pkt. 20c; 1/8 oz. 70c

Reselected live rose-pink with compact habit, greatly improved form.

-Snow White. PET-16. Pkt. 20c; Pure white, the best white in this classi- PHOTINIA (foh-TIN-i-ah)

-Topaz Queen. PET-17 Pkt. 30c; 1/8 oz. 70c

GRANDIFLORA NANA COMPACTA: These are dwarf plants about 8" tall, with an especially large flower; they are es-pecially fine for plants, boxes and baskets.

PET-18. Pkt. 50c; -Velvet Ball. Round, compact ball-shaped 8" plants 1/32 oz. \$2.00

PET-19. Pkt. 50c; -King Henry.

1/32 oz. \$2.00
HYBRIDA TYPE: These grow 18" tall, rather spreading plants that can be used anywhere; the flowers are not so large but they are extra floriferous and are hard to equal for the ordinary flower bed.

-De Luxe Bedding Blend. PET-20 Pkt. 20c; 1/8 oz. 50c

A beautiful blend of the most desirable varieties and in the very best color range.

-Formula Blend. PET-21. Pkt. 20c.

1/8 **oz.** 50c

MINIATURE TYPE: 8" plants with good sized plain bright flowers, each plant compact and upright and making the most beautiful effect in edgings.

-Bright Eyes. PET-22. Pkt. 25c; A soft pink color with white throat, giving the plants a "bright eyes" effect. Yery retty as an edging plant.

Best Mixed

-Best Mixed. PET-23. Pkt. 25c; A hand blend of 7 exquisite varieties. Very fine. These would make a grand display for a bare place in the rockery as well as an edging.

-Little Giants. PET-24. Pkt. 50c; 1/32 oz. \$1.40 A new type Petunia, 8-12" tall, plants

here are 160,000 to 2 seed in an ounce of seed. 260.000 Petunia

PHLOMIS (FLOH-mis)

Perennial plants belonging to Mint amily, suitable for the wild garden or hrubbery border. Easily grown from

PHLO-1. Pkt. 15c Showy long-lived perennials of easiest culture, 4 ft., vivid purple flowers in whorl above whorl, good.

PHLOX

A genus with mostly perennials and consisting of a varied list of plants; all are easily grown. The perennial sorts do well in a rather heavy soil, but all thrive in any good garden soil. While the best known are the tall perennials, they come in other types, creeping species that are suited for rock work.

-paniculata, New Hybrids, Mixed. PHLX-1. Pkt. 15c
Often listed as P. decussata. Common

name Summer Phlox.
Contains brilliant colors in large flowered plants, strictly first class selections;
perennial and will afford an interesting
collection of new colors and combinations.

-Drummondi, Gigantea, Mixed.

Easily grown summer annuals preferring sunny situations, light rich loam; if faded blooms are removed will flower again in the :all; excellent for borders, beds and cutting. This is an extra large flowered strain, florets !¼"-1½" across, blooming freely in massive trusses. This strain has taken all the prizes, 1 ft.

— Art Shades. PHLX-3. Pkt. 20c Soft pastel colors and delicate shades

——Art Shades. PHLX-3. Pkt. 20c
Soft pastel colors and delicate shades
in mammoth trusses of large flowers, 1 ft.

Cecity. PHLX4. Pkt. 20c
This is the finest large flowering dwarf
Phlox in existence, forming round compact
bushes about 6-8-in. tall which are covered
with its large flowers. These vary beautifully, most being centered white or dark
or striped; its regular and uniform growth
in all colors, grand display of shades and
the large size of the flowers, makes the
Cecity Phlox far above all other dwarf
sorts. PHLX-4, Pkt. 20c

PHLX-6. Pkt. 50c
Prostrate, with shiny leaves and big
flowers varying from white to deep pink.
One of the most beautiful species and
easy in the Northwest but regarded as
very difficult in the East; needs woodland
conditions of shade and humas, HP. Very
rare species.

difusa. PHLX-7. Pkt. 50c
A needle-leaved species forming dense mats a foot or more across, covered with fairly large blooms, usually lavender but occasionally white or pink. Needs very gravelly soil in full sun, with sharp drainage; under these conditions the western Phlox are fairly easy to grow in the East, in spite of their refuted difficulty; seeds germinate quickly, 6", HP.

PHLX-8. Pkt. 50c

PHLX-8. Pkt. 50c -speciosα.

PHORMIUM (FOR-me-um)

New Zealand Flax. Mågnificent plants for subtropical effects, somewhat suggesting Yuca in habit. The basal rootstock produces a great number of very long and narrow sword-like leaves, which may be more than 8 ft. in length. The flowers, up to 2-in. long are produced in a panicle at the top of a tall stem and may be either red or yellow. Seeds germinate very readliy, the seedling grow rapidly. Plenty of moisture is required to produce fine specimens. A pot plant in the N. although it is reported to have survived short periods of as low as 10 degrees F. New Zealand Flax. Mägnificent plants

PHOR-1. Pkt. 40c The larger of the two species with leaves as much as 9½ ft. long and 2 inches wide, dark green with bright red margins and keel. The flower scape is from 5-15 ft. high with tubular flowers of dull red or pure yellow, HHP, 5-15 ft.

---cookianum. PHOR-2. Pkt. 40c The oz. 70c and the size of P. tenax, with pade green leaves and slightly smaller pade green leaves, with pade green leaves and slightly smaller pade green leaves and slightl

Asiatic and deciduous evergreen shrubs and trees of Rose Family. The deciduous kinds are hardy in the North, the evergreens hardy only up to Georgia; they do best in a light sandy loam and sunny position; easily grown from seed.

PHOT-I. Pkt. 25c —integrifolia.

PHYGELIUS (fy-JEE-li-us)

Small shrubs from So. Af. with flowers resembling those of Penstemon; are hardy only in the S. but good greenhouse plants in N. Need no special care.

capensis. 2HYG-1. Pkt. 50c Cape Fuschia. Sub-shrubby, flowers crimson in clusters of 1-4 at end of branches; showy, 3 ft.

PHYLLODOCE (fi-LOH-doh-see)

Mountain Heath, Dwarf evergreen trubs suitable for the rock garden, re-uiring moist peaty soil and partial shade. hey are very hardy.

-empetriformis. PHYL-1. Pkt. 25c A heath with needle-like leaves and stems strewn with small red bells, from our western mountains; grows above timber line in grassy meadows, bogs or volcanic ash and should be treated like Heather in the garden altho it will need more moisture; very showy and choice for the sunny rock garden, 1 ft., HSh.

PHYSALIS (FIS-a-lis)

The Ground Cherry, whose tomato-like uit is enclosed in a balloon-like calyx. the Ground Cherry, whose tomato-like calyx. and the calyx it is enclosed in a balloon-like calyx. bey are easily grown, but may be started doors like tomatoes so that they will alt earlier. The Chinese Lantern Plant frequently grown for its brilliant orange calloons" which are prized for winter

PSAL-1. Pkt. 30c Shrubs of trees with finely cut ferny foliage, and heads or long sprays of rather small yellow flowers with a mass of golden stamens. They are hardy in the South, but in the North must be grown in a cool greenhouse, although they have been known to withstand temperatures of 20°. They need no special soil or culture. Hot water should be poured over the seeds, which must soak about 48 hours before sowing.

Evergreen shrubs and small trees native of N. Am. and Asia, of Heath Family. They grow best in sheltered positions and some are grown in the greenhouse; moist sandy loam with peat or leaf mold best. Easily grown from seed.

PIER-1. Pkt. 25c Drooping panicles to 6 in. long of urn-haped white or pink tinged flowers 1/3 n. long; shrub or small tree to 20 ft., ather tender.

Deciduous or semi-evergreen with short sprays of oblong white bells, 40 ft.

PLATYCODON (plat-i-KOH-don)

-grandiflorum, Mixed, PLTY-1, Pkt. 15a ers known as Balloen Flower. Flower or some at end of slender leafy stems a sell or star-shaped, very useful in the rogarden or border and considered by mangardeners as the most beautiful har clam't in cultivation; thrives in deep we drained sandy loam soil, easily grov rom seed planted early in the spring.

PODOPHYLLUM

(pod-oh-FIL-um) Perennial plants best grown in shady

—emodi.

A Himalayan relative of the common Mayapple of northern woods but much more handsome; mottled bronzy "umbrella" leaves and flowers white, mottled rich pink followed by brilliant scarlet fruits which are said to be edible; fully hardy and easy from seed which may require several weeks to germinate; woodland or several weeks to germinate. and easy from seed which may several weeks to germinate; woodland shady R.G.

Collected in western China by Dr. Hu, this has very showy red fruits and handsome branches, true name still unknown. Shade.

POLEMONIUM

(pol-ee-MOH-ni-um)

Small genus (Phlox Family) tall and dwarf, hardy perennials, very few annuals. The blue, white or violet flowers are showy and the foliage resembling fern fronds. Thrive in deep well drained loamy soil. The dwarf species make finne rock garden plants; the taller ones for the border. soil.

POLE-6: Pkt. 25c -carneum. -Coeruleum gracile. POLE-1. Pkt. 20c (Jacob's Ladder, Charity, Greek-rian). Grows 2 ft., fern-like leaves gorgeous sky-blue flowers with ye stamens.

Coeruleum, Large Flowered Blue. POLE-2. Pkt. 15c
Extra large flowered strain. -haydeni. POLE-3. Pkt. 20c

Ā very good native western species found on rock slides, blue or white flowers, 1-ft. tall, May-Aug. occidentale.

Native western bog species, robust

—pulcherrimum. POLE-5. Pkt. 25c
Easy and beautiful, rather short lived but self sows just enough to keep going; pale blue flowers, light woodland soils to gravels with leaf mold, gray foliage, fine rock garden plant, 6" high, HP.

POINCIANA (poin-si-AY-nah)

A very poular tropical genus of shrubs and trees of the Pea Family, all native of warm regions; when in bloom they are among the most beautiful shrubs or trees. Can be grown in the warmer parts of the South and easy from seed. Thrive in dry soils; soak seed in warm water before sowing and plant in sandy soil.

purcherrima.

Shrubby with delicate evergreen mimosa-like leaves and very showy red and
yellow flowers with long red stamens;
hardy only in the far South but may be
grown in the greenhouse and planted out
in summer. Does well in poor sandy soil POIN-1, Pkt. 50c purcherrima. in summer. Does we in hot dry locations.

glass or in the warmer sections of the country; the hardy native species do well in light soil and partial shade.

beautiful colors in white, orange and reds, picotee-edged, 2½-3 ft.

——Haddon Strain.

POPY-19H.

POLG-1. Pkt. 30c -artlata.

POLYGONUM

(poh-LIG-oh-num)

Large genus of annual and perennia greenhouse and hardy plants, of variable habits. Easy culture in good garden soil Most of the annuals can be planted early in the spring in open ground.

POLY-2. Pkt. 30c -amplexicaule. A handsome border perennial with cather heart-shaped leaves and crowded spikes 6 inches long of small rose-pink or white flowers, HP, 3-4 ft.

POLY-6, Pkt. 25c -emodi.

POLY-1, Pkt. 200 -orientale, Rubin. Hardy annual, an interesting cut flower and border plant with red flowers, flowers July-October, 1½ ft.

-macrophylum. POLY-5. Pkt. 35c -mollis. A shrubby species, with leaves downy beneath, and long narrow panicles of small white flowers. Will grow in mois places. HB. 3 ft. or more.

DOPPY

(Common name for the genus Papaver. These beautiful flowers come in both an nual and perennial sorts; they have a great range of color and we offer some new strains and varieties that are garge ous. They are easily grown by sowing seeds direct in the garden very early if the spring and in milder climates, ever in the fall; their best show is in mass plantings in the border. The annuals especially resent transplanting; full sur and well drained soil is required.

-bracteatum. Hardy perennial and differing from P. orientale in its solid colored petals and leafy bracts below the flowers. to hold the flowers upright, even after cutting. Color range is from deep scarlet through delicate pinks and buffs to pure white.

-Mac's Special Blend. Pkt. 15c: 1/8 oz. 50c -Sunbeam Mixture. POPY-6. Pkt. 15c:

A special high class blend of varieties and new hybrids, 2 ft., full color range. -The Empress. POPY-7. Pkt. 15c

Large flowered type in delightful salmon-rose shades. Mammoth flowers with a fine range of colors, husky grower. POPY-20. Pkt. 15c

orientale, Scarlet. POPY-8. Pkt. 15c Hardy perennial with large brilliant scarlet flowers. These not only will make a gorgeous showing in the border but in wild places, edge of woods and waste places, they seem to hold their own.

-orientale, Victoria. POPY-9. Pkt. 10c; A beautiful salmon-pink with black

-orientale, Mixed, POPY-10. Pkt. 10c and in Europe, and containing many fine varieties and hybrids. Scatter ½ oz. along the highway—very early!

RHOEAS-SHIRLEY POPPY:

(Corn or Flanders Poppy). The common field Poppy of Europe and Asia, and in the Shirley type, it has become very popular in America, coming in many colors and shades. Thin plants to 3-4 in, apart, they should be sown very early in the spring, in the South in the late fall. Hardy annuals, petals are crinkled.

-American Legion. POPY-11. Pkt. 10c. A dazzling orange-scarlet with black mark, very pretty in masses.

-Cavalcade. POPY-12. Pkt. 10c Double Begonia-flowered in a rich orange-scarlet color, very large flowers and most attractive, one of the better new varieties, 2 ft.

POPY-13. Pkt. 10c; Dazzler. A beautiful double flowered orange-scarlet Begonia-flowered flower.

-Ryburgh Hybrids. POPY-14. Pkt. 10c; Beautiful double Anemone-flowered in satiny shades of white, pink and old rose with white centers.

Sweat References

—Sweet Briar. POPY-15. Pkt. 15c; Beautiful double Begonia-like flowers in pretty Wild-Rose pink.

Begonia, Flowered Mixed. POPY-16. Showy double flowers in many colors and shades, 30 in. tall.

-All-Double Blend. POPY-17. Pkt. 10c; Lovely and dainty shades in beautifulation other colors.

-Single Shirley, Mixed. POPY-18 Pkt. 10c; oz. 45c Pkt. 10c; oz. 45c Contains all the single flowered varie-es in huge satiny and brilliant colors; I large plantings these make a gorgeous ight. Try sowing them along roads, etc

NUDICAULE:

(Iceland Poppy.) A perennial, to 1 ft., blooming the first year from seed and arely lasting more than 3 years. Its lowers are very beautiful and comes in a number of charming varieties, April

Amurense, Yellow. POPY-2. Pkt. 15c (Yellow Wonder.) Sensational new Poppy with showy Buttercup yellow flow-ers on 2 ft. stems, easy, established plants often start blooming in March.

Coonara Pink.

Gorgeous rose tints of varying intensity, a true strain; soft pink to deep rose, apricot, salmon, etc., 11/2 ft.

POPY-4. Pkt. 15c El Monte. POPY-4. Pkt. 15c

A new, beautiful deep tangerine-orange large fringed flower.

-Imperial Jewels. POPY-5. Pkt. 15c: A new superb strong stemmed flower in an extra large color range, a gorgeous display.

This is an extra good strain of the Gartland Poppy, grown in England. -Kelmscott Strain. POPY-22. Pkt. 20c;

⅓ oz. 50c The flowers of our new Kelmscott Strain are larger than we have ever seen before on any variety of Iceland Poppy, often measuring 3" across. Although the petals are of heavier texture they have the ame delicate waxy appearance; the stems are longer and so much more stiffer they tend

-Blends of all kinds. POPY-23. Pkt. 15c

POTENTILLA

(poh-ten-TIL-ah)

Perennials suitable for beds and borders, with some excellent rock garden plants; thrive in sunny locations in any good garden soil but prefer sandy soils, blooming from July to September.

argyrophylla. POTL-11. Pkt. 25c Sprays of showy yellow flowers an incharcos and silky leaves; for front oborder or edge of R.G. on sun, 16 in., HP

-climane. POTL-10. Pkt. 25c POTL-9. Pkt. 25c A silver-leaved trailer, with beautiful salmon-rose flowers, for the border or arge rock garden, HP, 11/4 ft.

gibsoni, Scarlet. POTL-1. Pkt. 20c Flowers June-October, 1 ft.

-- Nepalensis, Miss Willmott. POTL-5. Pkt. 20c
Bright carmine, best of species.

——White Beauty. POTL-6. Pkt. 20c
Fountains of snowy blossoms, foliage in autumn turns to bronze maroon, 1½ ft. -fragiformis. POTL-13. Pkt. 25c Syn. megelantha. Beautiful strawberry-like leaves of green velvet, flowers golden yellow, nearly 1" across, to 8" high, HP.

POTL-8. Pkt. 50c One of the best shrubs for the rock garden bearing tiny rose-like flowers all summer; yellow or rarely pure white. A variable plant in stature and habit of growth, ranging from prostrate forms to 3 ft. bushes. Easy from seed. It may be also used as a low hedge; not at all fussy about soil or exposure. -fruticosa.

-nepalensis Hybrids. POTL-2. Pkt. 20c

POTL-14, Pkt. 25c -replans. -tonqueii. POTL-12. Pkt. 35c -Warrensi.

Large flowers in massed golden color, very good, 18 inches. Potentilla Blend. POTL-7X. Pkt. 15c Contains many kinds.

PORTULACA

(POHR-tew-lak-ka) Usually treated as a hardy annual in the North although they are perennials. They are especially pretty in beds, borders, edging or in the rock garden, requiring full sun and average garden soil on the loamy side; they stand dry situations. Seed should be sown direct to the garden, mixing some soil with the seed and then pressing the surface of the bed so as to make a contact between the seed and the soil, sow in April. Plants are low growing and the flowers are very beautiful, 2-3 in. tall.

grandiflora, Double Mixed. PORT-1. Extra select, the flowers look like little roses, in pink, lavender, yellow, orange and red shades, very showy, 4 in. tall.

— — Single Jewels. PORT-2. Pk. 20c
A very free flowering dazzling crimson selection, about four times larger than ordinary single varieties.

-- Single Mixed. PORT-3. Pkt. 10c;

Bright glistening flowers in all the colors of Portulaca: they of Portulaca; they are especially pretty with their wide open flowers.

A hand made blend of all.

PRIMULA (PRIM-you-la) Primroses. A very large genus, mostly low growing and flower parts always in 5's. They are exceedingly useful plants and adapted to various uses. We will attempt to divide the offerings into classes to make selections easier. They require a deep moist soil, coolness with some shade, sow seed late in fall or very early in spring. Greenhouse species follow special cultural requirements.

—auricula (Hayward). PRIM-36. Pkt. 50c Seed saved from a collection of choice plants in many diverse colors and shades. Height 6-12 inches, HP.

——(Hayward). PRIM-37. Pkt. 50c
Seed saved from segregated plants with
flowers of a fine deep crimson only.

-capitata. PRIM-23. Pkt. 50c
Rich Tyrian purple, leaves whitish beneath, a lovely species, 1½ ft., HP. Coldeniana. PRIM-16. Pkt. 90c (Often incorrectly called P. roylei). A member of the group containing P. edgeworthii and P. scapigera, which are currently causing a sensation in Primula circles. Flowers 1 in. across, royal purple or rich maroon, darker in the center, with yellow eye, borne in many-flowered umbels on short stems. Grown in sheltered north facing crevice or in a pot, tin soil rich in humus with some winter protection from sudden changes in temperature; very rare in cultivation.

denticulata. PRIM-2. Pkt. 25c Dense heads of pale blue-purple flowers. Hardy alpine species used in rock garden.

elongata.

Related to P. obliqua and of similar needs; the elongated flowers are pale yelow, 1 ft., HP. PRIM-33. Pkt. 35c

-elwesiana. PRIM-17, Pkt. 50c A very rare and unusual species, often placed in the related genus. Omphalogramma, as its flower parts are in sixes instead of fives; the flowers are rather bell-shaped, with long fringed lobes of rich purple; does best in cool moist climates, seed is slow germinating, HP, 1 ft.

—floribunda. —japonica. PRIM-29, Pkt. 50c PRIM-25, Pkt. 50c Purple-crimson flowers, fine for naturalizing in wet places, 2 ft., HP.

-iuliae. PRIM-35. Pkt. 50c -kashmiriana. PRIM-37, Pkt. 50c

-kewensis. PRIM-3. Pkt. 30c Golden yellow fragrant flowers, usually grown under glass, a well known hybrid. -kingii. PRIM-19, Pkt. 50c

Hingii.

Bells of rich purple or blood crimson, over small leathery oval leaves; a most beautiful species but quite difficult; best grown in light shade in cold frame or

-malacoides, Mixed. PRIM-4. Pkt. 35c Fairy Primroses, a delicate looking plant popular as a winter greenhouse plant. Seeds sown in March will produce plants in late fall.

- Heinemann's Brilliant Red. PRIM-30. Pkt. 50c
A beautiful new German variety from
the famous Heinemann collection.

- Heinemann's Baby Rose.

PRIM-31, Pkt. 50c A new Heinemann P. malacoides, in a beautiful shade of rose on a compact plant.

-obconica, Mixed. PRIM-5. Pkt. 50c It makes a very popular winter house plant for greenhouse growing. This strain has gigantea-type flowers and is in the best colors.

- gr. fl. Mixed. PRIM-6. Pkt. 40c A bright blend of one of the prominen European growers, large flowers.

——gigantea. PRIM-32. Pkt. 50c
New Heinemann P. obconica in large
brilliant flowers; very choice strain.

PRIM-18. Pkt. 50c --obliqua.

A very beautiful species of the Nivalis group with large pendulous flowers varying from white to deep yellow and rarely to flesh or pink. It needs rich soil in very light shade and should, if possible, be planted where it is buried in snow all winter, otherwise it should be carefully covered with rock wool while dormant.

—reticulata. PRIM-21. Pkt. 50c
Rather similar to P. sikkimensis, with drooping 'yellow bells; young seedlings are rather delicate but become more vigorous the second season, 1 ft., HP. PRIM-35. Pkt. 50c

Purple-crimson flowers, 15" tall. PRIM-22. Pkt. 50c -sapphiring.

A tiny species, with small leaves and short stems bearing one to four rather small flowers of brilliant deep blue. Not one of the easiest species, requiring cool rich gritly soil and ample moisture during the growing season. HP. 2-in.

PRIM-21, Pkt. 50c An easily grown species with long-petioled basal leaves and foot-high naked stems from which dangle a cluster of drooping yellow flowers. Seed germinates readily, and the plants will grow in sun if given plenty of moisture. HP. 1 ft.

Smithiana. PRIM-24. Pkt. 50c Close to P. bulleyana, a species with whorls of yellow flowers in midsummer; likes moist locations by stream or pool in light shade, 1-2 ft., HP.

ght shade, Ps.

-sinensis fimbriata Mixed. PRIM-7.
Pkt. 50c

Chinese Primroses. Popular greenhouse flowering plants blooming in late autumn from March sown seed. They are much like P. malacoides in appearance. This strain has fimbriated petals. Extra choice

— — fimbriata Mixed. PRIM-8. Pkt. 35c Giant sized flowers, fringed petals. -- Giants. Made up only from the giant flowering varieties, very extra.

A Holland strain of the best fringed varieties.

Like a tiny Geranium in leaf, with wine-colored flowers; may be comewhat tender and should be grown in a sheltered shady place in leafmold.

-veris elatior. PRIM-11. Pkt. 25c Oxlip. Pretty little Wild Primrose of N. Europe, 5 in. tall with nodding yellow

---White Swan. PRIM-12. Pkt. 35c pretty white flowered variety. -Hybrids. PRIM-13. Pkt. 35c

Extra choice strain of this hardy spe -wattii. PRIM-34, Pkt. 50c Funnel-shaped, drooping, purple flowers

PROBOSCIDEA

(proli-bo-SID-ee-ah)

Proboscis Flower, Unicorn Plant. Annua and perennial with large, long stemmed leaves, large purple flowers and okra like fruits.

PROB-1. Pkt. 15c - jussieui. Listed incorrectly as Martynia. Native from corn belt southward and grown both for ornament and for its fruits, which when soft and immature are pickled, either alone or with other vegetables. In the North start indoors under glass and set out after danger of frost is passed. Set out like cusumbers. Set out like cucumbers.

PRUNELLA (proo-NEL-ah)

Brunella. Small perennial plants of Mint Family, with purple or violet flowers in close-set heads or spikes. Used in shady part of border and rock garden. Are easily naturalized in the wild garden.

PRUN-1. Pkt. 20c -gr. fl. roseα. Many spikes of rose colored flowers rise from flat foliage mats, excellent rock garden or edging plant, 1 ft.

PRUNUS (PROO-nus)

A genus of stone fruits, many valuable orchard fruits. Many are very hardy in the North and they have very showy the Nor flowers.

PNUS-1. Pkt. 25c -accuminata, PNUS-2. Pkt. 25c ---nepalensis. PRUN-3. Pkt. 35c ---prostrata.

PYRACANTHA

(pir-ah-KAN-thah)

Firethorn. Mostly thorny shrubs belonging to Rose family; where hardy they are beautiful shrubs; a sunny position, well drained soil is best.

Gibbsi. Regarded as one of the best small dark green leaves and masses of very brilliant scarlet berries; best trained as a climber.

QUAMOCLIT (KWAM-oh-klit)

Annual and perennial twining vines be longing to the Morning Glory Family, ofter called Star Glory; treat as tender annuals; easily grown from seed; used as summer flowering vines of light and rapid growth thriving in rather light soils and in sun

Robust perennial with 3-lobed heart-shaped leaves and crimson flowers fading to pale yellow.

flowers. Easily grown; blooms mid-sum-mer till frost.

—eleaginoides.

A very small

QUAM-3. Pkt. 20c --sloteri. A hybrid between Q. nata Palmately-lobed occinea and Q. pinnata. Palmately-loeaves and cardinal-red flowers with w hroats. Grows summer till frost.

QUAM-4. Pkt. 15c

QUEEN ANN'S LACE

QANL-1. Pkt. 10c:

An annual cut flower, 2-2½-it. tall, with inely cut foliage and filmy white flowers n umbels. It makes a very good cut lower for a filler, is easily grown. Do not allow it to go to seed as it can become a weed.

RAMONDA (ra-MON-dah)

Ramondia. Small plants making flat osettes of hairy basal leaves, stems 3-4 n. bearing several 4-5 pointed flat flowers, esembles Saintpaulia to which it is redescribes Scintpaulia to which it is re-cted. Fully hardy, likes north facing revices in rock wall, soil largely leaf hold and sand. Sow seeds as for Saint-baulia, seedlings develop slowly.

—pyrenaica. RAM-1. Pkt. 50c Brilliant lavender flowers Primula-like flowers, for north rock wall. 4 in., HP.

RANUNCULUS

(rah-NUN-keu-lus)

A large genus widely distributed and known under the names of Buttercup and Crowfoot. The Buttercups are perennial and easily grown from seed; the Crowfoots have yellow flowers and both do well in well drained soil and sunny positions. Most of the species are perennial. Many of the Crowfoots make fine rock garden plants.

ASIATICUS: (Turban or Persian Butter-up). It is grown in the greenhouse or utdoors during summer and not con-idered hardy. It has tuberous roots which should be taken up and stored over winter. It must be grown cool and ikes a moist atmosphere.

-hirtellus. RUN-4. Pkt. 50c A very variable Asiatic species and in its best forms, with 2 inch flowers of yel-low, white or pale rose, on short stems; perennial and a plant well worth gambling

-montanus. RUN-6. Pkt. 35c RUN-3. Pkt. 25c superbus. Bacultiul spring flowers in shades of pink, white, red, yellow and rose; sow eeds in flower pot, covered with glass as termination requires 30-40 days, perennial.

RUN-5. Pkt. 25c

RASPBERRY

-Crimson. RASP-1. P. From the Himalayan Mountains.

RHODANTE

RHOD-2, Pkt. 10e -manglesi. Rose, everlasting, hardy annual.

RHODODENDRON

(roh-doh-DEN-dron)

They are easy to grow if given a few some special attention to their requirements. They all prefer acid soils, most of them do best in partial shade and the evergreen sorts need wind protection. All dislike hot sunshine. Their gargeous flowers and magnificent foliage well repay those who give them the attention necessary. About all are at home on the Pacific coast, they also can be grown in the South but in the North only the hardy species should be attempted. They all require an acid soil between pH 4.5 and pH 5.2, containing much fibrous material; the roots grow near the surface and thus should be provided with moisture but not a soggy soil.

-aeruginosum. RODN-1. Pkt. 75c A compact head of about 10 flowers 175th.

A compact head of about 10 flowers 175th.

In. long, lilac rose to reddish purple spotted with deeper color, 6-8 ft. (Campanulatum Series).

RHON-24. Pkt. 75c —albrechtu. At Albra, Pkt. 75c
A deciduous Azalia with vivid rose
flowers and leaves that turn bright yellow
in the Autumn; hardy to Boston; late
blooming and fine for open woodland
Azalea series, Camadense subseries, 3-5 ft.

ROHN-3. Plet. 75c An alpine species with fair-sized pink flowers resembling Dapline in appearance, 2 ft. It is said that this species cannot endure clay soil and it needs an open northerly exposure. (Anthopogon Series)

RODN-2. Pkt. 75c A glorious tender tree-like species, for mild climates only. The flowers are up to 2 inches across, deep scarlet with deeper dots and in huge clusters. Grows as much as 40 ft. (Arboreum Series),

-barbatum. ROHN-4. Pkt. 75c Another rather tender tree-30-50 ft. high with somewhat smaller flowers of deep crimson or blood red, in dense trusses. (Barbatum Series).

-camelliaeflorum. ROHN-5. Pkt. 75c Sometimes epiphytic, rather tender, with flowers inch-wide, white tinged pink and borne singly. For greenhouse culture in the North, 2-6 ft. (Camelliaeflorum Series).

-campanulatum. RHON-6. Pkt. 75c Loose trusses of flowers 1½ inch long, anging in color from white to shades of jurple; a very early bloomer, shrub 12-19 t. tall. (Campanulatum Series). RHON-6. Pkt. 75c

BOHN-20, Pkt. 75c -campbelliae. Sweet scented, flowers 2 in. long, white flushed yellow and rose; very beautiful species and not hardy in N. Maddenii Series (Gibsoni). RHON-25. Pkt. 75c

campylocarpum. RHON-7. Pkt. 75c
Perhaps the finest yellow-flowered species, a moderate-sized rounded bush, 1-8 ft. tall. Has loose trusses of flowers 1/2 in. long and 2 in. across, clear canary yellow or pale yellow, sometimes with a caint crimson blotch at the base. (Thompsonii Series).

A tender species for greenhouse or ver mild climates, with 2 in. flowers eithe white or tinged rose; extremely free flower ing and handsome; 3 ft. tall. (Maddeni Series). RHON-8. Pkt. 75c

RHON-9. Pkt. 75c A magnificent species with rather tubu-lar flowers up to 2 in. long, of cinnabar or brick-red, free flowering. Well worth trying, especially south of New York, 6 ft. (Cinnabarinum Series).

RHON-10. Pkt. 75c —pinnate. QUAM-2. Pk. 20c

Cypress Vine. Slender annual twiner to 20 ft. with leaves divided into fine one of the finest of all species. (Madenii thread-like segments and showy scarlet Series).

A very small alpine shrub with solitory bright yellow or reddish purple flowers about 1 in. across. For slightly shadded positions in the rock garden. (Lepidotum Sprice)

RHON-21. Pkt. 75c RHON-12. Pkt. 75c

Large bright scarlet flowers on a med um sized shrub and very early flowering; rom high altitudes and fairly hardy Campanulatum Series).

A dwarf shrub with inch-long flowers pale old rose; very aromatic foliage a good one for the front of the border Glaucum Series). RHON-13. Pkt. 750

A magnificent small tree with enormou leaves and big flowers of white or cream with purple blotches, in big clusters, pin in bud. Hardy on the West Coast. (Grande Series).

-Griffithianum. RHON-22, Pkt. 756 A magnificent species with flowers 1/2 in. long and 6 in. across, white reen spots often flushed with pi green spots often flushed with pink shrub to 10 ft., tender (Fortunei Series).

A tall shrub with rather small flower, that open dark magenta-purple and fade to a dull lilac. The shiny green foliage is particularly handsome; rather tender (Falconeri Series).

-Lady Alice Fitzwilliam. RHON-26.

RHON-16. Pkt. 750 --lanatum. A bush or small tree with good sized flowers of pale yellow with crimson spots; one of the more fussy species but attractive when well grown. (Companulatum Series).

-RHON-23. Pkt. 75c -Maddeni.

RHON-21. Pkt. 750 —ponticum. RHON-21. Pkt. 75
A tall and vigorous growing specie
rom Asia Minor with rather narrow leave
and head of 10-15 lilac-purple flower
about 2" across. Much grown in Englan
and is one of the parents of many garden
upbrids; not quite hardy N. of Philadel
chia, it is very useful for grafting stocl
even in cold regions; mass plantings in
ight woodlands can be very effective.

One of the finest of all, 2 inch flowers of deep blood red, fleshy and waxy, extended the blooming. A tall bush, with ounded bluish-green leaves. Unfortuntely attempts to grow it outside in the last have not been successful. (Thomponii Series).

-var. candelabrum. Pkt. 75c A variety with paler colored flowers.

—wightii. RHON-19. Pkt. 75c
A small tree with large rounded umbels of pale yellow flowers, spotted with crimson. Very attractive and early flowering; this has not been tried in the East to our knowledge. (Lacteum Series).

RHEUM (REE-um)

A strong and vigorous growing Asiatic genus of perennials of which the Rhubark is the most popular, here, Other species are used for bold effect in the border.

RHEM-1. Pkt. 40c -nobile. —**noble.** HHEM-1. Pkt. 40c
The stem is densely covered with overlapping downward pointing bracts, which
are strikingly effective; a fine plant for
foliage effect, especially when young with
its white leaves and stems; mulch well in
winter, 4 ft., HP.

—acuminatum. RHEM-2. Pkt. 50c
A relatively dwarf shrub with stems
and flowers a deep red-purple; most effective against background of foliage,
HP, 2-3 ft.

RHODCHYPOXIS

(roh-doh-HY-pok-jis)

Beautiful little bulbous plants from So. Af., very rare in cultivation; making a dense tuft of short grassy leaves and bearing throughout the summer, flat 6-pointed stars % in. across; like moist but well drained sandy soil, in half shade; hardiness uncertain but will stand 20 degrees. They can be wintered in a cool basement window, apparently they prefer not to dry out completely.

---baurii. RHOX-1. Pkt. \$1.00

The most showy with brilliant rose to white flowers, flowering all summer and makes a charming pot plant as well; slow to increase and very rare in seed; from Basotoland; cool positions, hardy.

RICINUS (RIS-i-nus)

Castor Oil Bean. Tender annuals grown for their tropical foliage effect as centers to large beds; start seeds indoors in small pots for early plants, soil should be rich and well drained. The seed is recommended for ridding gardens of moles, placing the seed in the runways; the seeds are poisonous—do not let children play with them.

-borboniensis orboreus. RIC-1. Pkt. 10c; oz. 25c One of largest types, red stems and red leaves with a flower to 10-ft.

RIC-2. Pkt. 10c; ox. 25c; 1/4 lb. 60c
Dark foliage, blackish purple stems. -Major. RIC-4. Pkt. 10c; ox. 25c: 1/4 1b. 60c (Communis). Tall true Caster Oil Plant. Leaves large, sometimes 3-ft. across.

-zanzibariensis. RIC-6. Pkt. 10c. A large variety with little if any red color to the foliage, large flat seeds, mot-lied bright red over gray or brown ground color.

- - viridis. RIC-7. Pkt. 10c: os. 25c; 1/4 lb. 60c Green foliage, 10-12-ff.

RIC-8X. Pkt. 10c: -Mixed. oz. 25c; 1/4 lb. 55c

ROHDEA (ROH-dee-ah)

ROHD-1. Pkt. 25c -japonica. —japonica, HOHD-1. Pkt. 2 Sacred Lily of China. Highly ornament olicige plant for pot culture, useful fi louse culture. They can be grown or loors in a shady place in mild climates.

We list here those species of the genus Rosa that are shrub-like and that can be grown from seed. The seed, as a rule, should be planted outdoors in late autumn or early spring, best in a frame, for protection. ROSE-3. Pkt. 20c -multiflora. ROSE-3. Pkt. 20c about ture.

RHON-11. Pkt. 75c shrub with fragrant white flowers like clustered blackberry blossoms. Use as under dish purple flowers stock for garden roses.

ROSE-1. Pkt. 20c This is a selection with flowers in who blush or pink and rose, the flowers tiny and cover the bush. Easily gritom seed, and many even form flow he first year. Fine for rock garden, and or pot plant, perennial. -polyantha nana.

ROSE-2. Pkt. 25c Himalayan Wild Rose. Single white

RUBUS (ROO-bus)

Brambles. Native shrubby plants of the colder regions, belonging to the Rose Tamily. Some are especially good fruits and a few grown as ornamentals.

RUBS-1. Pkt. 20c -moluccanus. Very robust species with very variable eaves, white flowers and red succulent ruits; a tropical species, perhaps tender.

RUDBECKIA (rud-BEK-i-ah)

Coneflower. Conical shaped disks of daisy-like flowers; they thrive in any soil and either sun or partial shade, the seeds can be planted early outdoors or started ndoors. They are sturdy growers and make fine displays in mass plantings in the border.

amplexicanlis. RUD-1. Pkt. 15c 3-ft. tall, flowering July-Sept., golden rellow with dark black center.

RUD-2, Pkt. 10c;

Golden yellow petals with dark centers, n many different shades, 1-1½-ft. tall, they hake a showy display in the autumn when most flowers are gone. -bicolor, Golden Sunset. RUD-3. Pkt. 10c

Double, golden flowers, —flava. RUD-4. Pkt. 15c Perennial, blooming May-June, 2-ft., golden yellow flowers and dark centers.

—hirta, Herbswald. RUD-5. Pkt. 15c A Swiss novelty, blennial cut flower, flowering first year; mostly red colored. -Star of Kelvedon, RUD-7. Pkt. 10a Golden yellow with dark brown central disc, long stems, 2-2½-ft. biennial.

——My Joy. RUD-10. Pkt. 20c
A new German variety, large pure golden yellow with black center, 4-in. across, 2-ft. perennial. It is an exceptionally good cut sort, June-Frost. RUD-10, Pkt. 20c RUD-9. Pkt. 10c

——New Hybrids. RUD-9. Pkt. 10c This contains many different forms and will produce a mass of cut flowers. Peren-

Large flowers of pinkish petals and large dark cone, petals hang downward giving it an extra pretty effect, fine both as a border plant or for cutting. July-Sept., 2-ft., pereanial. —purpurea gr. fl. RUD-11. Pkt. 15c Giant Purple Coneflower. Large reddish purple flowers 4-in. across with a black purple cone, 3-ft., blooms all summer, perennial. RUD-11. Pkt. 15c

RUD-13. Pkt. 15c Large semi-double flowers ranging from primrose yellow to mahogany with many showy bicolors having mahogany centers 3-ft., blooms all summer, hardy annual.

-Rudbeckia Blend. RUD-14X. Pkt. 15c; Made up of many varieties and in all species including all those offered above with hybrids also. A lot of beautiful flowers till frost.

RUMEX (RU-meks)

While most are weeds and not suitable for gardens, we list those that do have garden value. Easily grown from seed. A curiosity from New Zealand, like a brown seaweed, probably not very hardy.

SABAL (SAY-bal)

Palmetto. About 20 species of spine-less and often stemless palms, native from N.C. southward. Those that make trunks are very ornamental and can be grown in tubs, and wintered in the green-nouse.

SABL-1, Pkt. 50c Texas Palm. A small ornamental palm native of Texas.

SALPIGLOSSUS

(sal-pi-GLOS-is)

Painted Tongue. Half hardy annuals from Chile, the "Paisly Flower", suggests well the exotic beauty of its coloring; rich velvety tones of purple, blues, yellow reds and white veined with gold. Flowers funnel-shaped, 2½-in. across. They make their best growth during cool weather, leave their best growth during cool weather, flowering in July till frost; they are highly their best growth during cool weather, flowering in July till frost; they are highly prized as cut flowers. Best in sandy soil and partial shade, not too rich for best coloring; started about July they make fine winter plants for indoors. Height 2-ft. They can be planted amongst perennials. The seed is very small and care must be used in planting them, germinate them in light and warm. All are of species of sinuata or its variety, superbissima, which is unbranching and thus more upright or columnar.

-Dwarf Giant Flowered. A shorter more bushy type with large flowers in a beautiful color range, 1½-it. SALP-2. Pkt. 20c (Superbissima). More upright growth, his is definitely a superior strain, out tanding in size and color of flowers and agor; grown from the finest separate colors with heavy gold threat varieties. SAUSSUREA (sau-SEU-ree-ah)

Temperate zone plants of Composite Family with heads of blue or purple disk-flowers; easily grown from seed and ornamental in the border.

SAUS-1. Pkt. 50c -gessypiphora.

(san-vi-TAY-li-ah)

SANVITALIA

A genus of small American plants whose flower heads resemble Rudbeckias. Easily grown as annuals in dry warm rich soil and with winter protection may grow as

Procumbens, Double. SANT-1. Pkt. 15c
A low hardy annual border plant called
Creeping Zinnia, blooming in late summer
and fall; small orange-yellow Zinnia-like
double flowers on trailing plants for hot
dry situations and rock gardens.

Keep Salvia Warm Be sure to germinate Salvia at

about a 60 degree night tempera-

Sage. A large genus of herbs, subshrubs and shrubs belonging to Mint Family and including many valuable ornamental plants, ranging from 2-4-ft. talk. While they are perennials, some are half hardy in the North and others are extremely hardy. They are easily grown in good garden loam, in a sunny position. We grow many species ourselves for seed.

SALVIA

We grow many species ourselves for se SCARLET SAGE: S. Splendens. E known and most used, its colors are on in red shades, and it is used entirely bedding. There is one white varies Treat as an annual, start seed indoors of ing February or March and set out addanger of frost is past. Care must used in germinating seed, germinate Sight and with temperature ground 60 ght and with temperature around 60 at

SALV-1. Pkt. 30c;

Globe of Fire. Earliest and continuous bloomer, very uniform, 20-in. tall, flowers brilliant scarlet. -Blaze of Fire. SALV-2. Pkt. 40c;

Dwarf and early flowering, 12-in. high, and blooms 10 days earlier than any other variety. SALV-3, Pkt. 30ca -Bonfire.

Very compact oval bushes, 2½-tt. high, brilliant scarlet flowers, stems stand up stiff and erect with 200 spikes or more on a single plant.

SALV-4. Pkt. 30c; -Brightness. Brilliant scarlet, long spikes, $2\frac{1}{2}$ -ft. tall, erect bush.

SALV-5. Pkt. 30c; -Harbinger. An improved dwarf type, very early, flowers dazzling scarlet, 1½-ft., compact habit. 1/4 oz. \$1.25

SALV-6. Pkt. 30c; A popular dwarf variety, very early with fine color and habit, $1\frac{1}{2}$ -ft.

-St. John's Fire. SALV-14. Pkt. 25c; Finest, earliest, bright scarlet spikes, stands densely and rigidly upright on uniform and compact plants, 10-in.

> SALV-8. Pkt. 25c:

1/4 oz. \$1.25 The quickest and easiest annual Salvia, giving long blooming season when seeds are sown directly where plants are to stand. So quick that it is not necessary to sow under glass and transplant. Spikes of carmine-scarlet flowers with deep brown calyces. This is not a strain of Salvia splendens, but a botanically distinct speries. calyces. Th splendens, species.

Mealycup Sage. Forms a large clump of silvery foliage and lavender-blue flow-ers, rich soil, HP, 2-3 ft.

-farinacea, Blue Bedder. Pkt. 20c

An improved compact form with deeper blue flowers on longer spikes; excellent in border or for cutting, hardy with some protection, Aug.-Oct., 21/2-ft.

—jurisici. SALV-10. Pkt. 20c Splendid low growing hardy Salvia, α rare rock garden species from the Balkan Mountains, spikes graceful color violet, very pretty, free flowering and long lived.

microphylla.

Baby Salvia. The daintiest and most delightful of the Salvias, dwarf, compact, everblooming; first introduced as a winter flowering pot plant for which its use is unexcelled but is easy to grow in the garden as other Salvias. White bracted buds open to blossoms of carmine-suffused coral-rose; plants shaped like upper half of hour glass, foliage dark olive green, dense, 16-in.

SAPONARIA

(sap-oh-NAY-ri-ah)

The Soapworts. Easily grown hardy annuals and perennials, some species are fine rock garden plants, belonging to the Pink Family.

-calabrica, Mixed. SAPO-1. Pkt. 15c (Multiflora). Hardy annual with small deep rose, white and blood red flowers in profusion, ideal bedding plant, 9-in.

-ocymoides. SAPO-2. Pkt. 10c; 1/4 oz. 25c

rs, flowers very pretty, hardy annual, 2-tt. — alba. SAPO-4. PEt. 15c Hardy annual with pretty white flowers, ideal for cutting.

SAUSUREA

gossypiphora. SAUS-1. Pkt. 25c Dwarf plant, 6-12" tall, flowers in large ambels enclosed inside thick wooly substance; silvery gray with black

SAXIFRAGA

—aizoon densa.

(sak-SIF-rah-gah)

(sak-SIF-rah-gah)

Rockfoil. Mostly hardy perennials, rarely annual, native of temperate and arctic regions; flowers mainly yellow or white and the leaves usually in rosettes at base of plant. All are beautiful and interesting subjects for rock gardens or walls, the plant being as ornamental as the flowers. Combined with Sempervivums and Sedums, they can make a rock garden. Seed can be started in late summer, protected during winter and the plants set out in the spring.

Late winter or early spring sowing is best.

SAX-5. Pkt. 25c -aizoon minor. SAX-6. Pkt. 25c -aizoon rosea. SAX-7. Pkt. 25c SAX-1. Pkt. 25c
Stream side, native western species, best
in wet places, white flowers, 8-10-in. tall,
flowering July-Aug.

-burseriana magna. SAX-13. Pkt. 25c -burseriana sulfurea. SAX-14. Pkt. 25c ---cartilagenea. SAX-8. Pkt. 25c --crustata. SAX-9. Pkt. 25c -ceratophyllum.

SAX-10. Pkt. 25c -cuneifolia infundibuliformis. SAX-19. Pkt. 25c

-decipiens. SAX-11. Pkt. 25c -decipiens, H. S. Stokes.

—godsefferiana. SAX-15. Pkt. 35c SAX-2. Pkt. 25c -liquiata. Very low growth, rhizomatous plant, with pink flowers and ornamental leaves; best for rockery.

SAX-16. Pkt. 25c -irvingii. -obrisiii. SAX-17. Pkt. 25c

SAX-3. Pkt. 35c Purpurascens. SAX-3. Pkt. 35c A very handsome species of the Meyacca type, with large glossy leaves, clump-forming, and nodding purple bells; foliage turns red in autumn. For the shady border or edges of the rock garden, easy and vigorous, HP, 9 inches: -purpurascens.

SAX-18, Pkt. 25c -sancta. SAX-20, Pkt. 25c --- virginiensis.

SCABIOSA (skay-bi-OH-sah)

Mourning Bride or Pin Cushion Flower Mourning Bride or Pin Cushion Flower. Easily grown in an open sunny situations, seeds being either started indoors or planted direct to garden; pinching back the annual forms will produce nice bushy plants; keep flowers out and they will bloom all summer, excellent out flowers. As the annual forms flower, best in the early part of the season, start seed early for the best bloom, in milder sections sow in the fall.

-caucasica, House Hybrids. Pkt. 25c Green and bronze foliage, 10-12-ft. Many

These improved giant hybrids are exquisite in the garden and an excellent cut flower, one of the loveliest perennials. Colors light and dark blue, and various mauves and lilac shades.

SCAB-2 -columbaria, Lavender. Delicate Lavender. Perennial in an attractive lavender-blue, 1½-ft.

- Delicate Pink SCAB-3. Pkt. 20c Orchid pink with a pink sheen, 2-ft.

-Imperial Giants, Hybrids. SCAB-4. —Imperial Giants, Hybrids. SCAB-4.

Pkt. 10c; ½ oz. 50c

A great advance in annual Scabiośa development extremely large well formed
flowers which are fully double, composed
entirely of broad frilly petals, rounded beehive shape; plants very upright, long wiry
stems and excellent for florist or garden
planting; new and unusual colors, 3½-4-ft.

—Imperial Giant, Blue Moon. SCAB-5.

Pkt. 10c: ½ oz. 60c

Large dark lavender-blue, made up of broad, heavy, waxy petals without the pin-cushion center, pretty.

-Giant Flowering Hybrids.

An extra select large flowering compact hot house strain.

EIGHT SPECIAL STRAINS ANNUAL

Definately a much better strain than the ordinary strains; selected by one of the best flower seed growers thru many years, these varieties have been improved to near perfection in purity, size of bloom, as well as in the length of the strong wiry stems. We especially recommend these varieties to critical Scabiosa growers.

-Ageratum Blue. SCAB-7. Pkt. 10c; oz. 90c Pretty light blue. SCAB-8. Pkt. 10c; -Azure Fairy.

oz. 90c Azure blue, fine color. SCAB-9. Pkt. 10c; oz. 90c

-Orchid Shades. SCAB-10. Pkt. 10c; ox. 90c Soft rose-lavender blends

-Peach Blossom. SCAB-11. Pkt. 10c; OE. 90c Peach blossom pink

SCAB-12. Pkt. 10c; -Rosette. oz. 90c Deep suffused salmon.

-Salmon Beauty. SCAB-13. Pkt. 10c: ox. 90c Pure salmon, rich coloring.

-Shasta Improved. SCAB-14. Pkt. 10c; Pure white of enormous size.

Blend of Above 8 Varieties. SCAB-15X. Pkt. 10c; oz. 90c; 1/4 lb. \$3.00

SCHIZANTHUS

(sky-ZAN-thus)

Beautifully marked and unusually formed flowers in chamois, rose, lavender, and purple shades with fern-like foliage. Excellent for pot culture the year round and partly shaded beds, doing best in cool climate; pinch tops off young plants to induce bushy plants; for winter use, sow in Sept., for February to May bloom; for summer bloom outdoors, sow indoors in March, setting plants out when weather becomes warm in May. Schizanthus makes up beautifully in corsages, are long lasting and very pretty, 1½-ft.

SCHZ-1 -Dr. Badger's Hybrids. Pkt. 20c Large flowers, brilliant range of colors from light pink to deep purple through rose, but without any whites. Each flower with a large golden blotch. Plants compact, 12-14-in. tall. Outstanding for the

best florist's trade. SCHZ-2. Pkt. 15c -Butterfly Mixture. A fine bright mixture free flowering, compact pyramidal plants, 12-15-in.

-Chislehurst Hybrids. SCHZ-4. Pkt. 15c A large flowered pretty French strain in violet and purple shades.

-Schizanthus Blend. Pkt. 15c; ¼ oz. 95c Blend of above strains and others from different growers. High class in every

-wisetonensis. SCHZ-6. Pkt. 20c Hybrid between S. pinnatus and S. grahmi showing many variations in color and form, rose shades, 16-in.

SEDUM (SEE-dum)

Mostly hardy, succulent or fleshy, erect or prostrate plants, easily grown and of much use in rock gardens. They do best in a light soil and a sunny location; no rock garden can be considered complete without its Sedums; they are especially appealing to children. Sow seed in summer when the seedlings can be wintered over for setting out in their permanent position in the spring, or they

Pkt. 20c | can be started in the spring. SEDM-2. Pkt. 25c -acre. -caeruleum, azureum. SEDM-1. Pkt. 20c Blue flowered annual for rockery. SEDM-4. Pkt. 25c -tatarinowi. SEDM-3, Pkt. 25c -liebergli.

SENECIO (se-NEE-shi-oh)

Groundsel. Large and variable genus, herbs, shrubs and trees belonging to Daisy Family, including the florist pot plant Cineraria. In general, they are easily grown in good loamy soil.

-diversifolia. SENE-5. Pkt. 25c Low growing shrub with leyyow floers Collected in the Himalayas, but we have no description as yet.

purshiana. SENE-3. Pkt. 20c

A native western species, light gray foliage, 6-10 inches tall.

SENE-4. Pkt. 250 Very attractive low climber with loose panicles of yellow-rayed daisies in summer; fairly hardy but should have some winter protection in N. Fine grown against a south wall, HHP, 3-4 ft.

SIDALCEA (si-DAL-see-ah)

Flowers are like miniature Hollyhocks in spikes or clusters; should be planted in rich sandy soil; the perennial species bloom over a long period; usually about Stark's Hybrids. SIDA-1. Pkt. 15c Hardy perennial in a wide color range; flowers like miniature Hollyhocks, 3-ft.

SIEVERSIA (se-VER-se-a)

A small group of Western plants closely related to, and often called, Geum; one or two are also found in N.E. Asia. They are rather dwarf, hardy perennials, with compound leaves and geum-like flowers, but are much more hardy; suited to the rock garden or wild garden. Culture same as for Geum.

SIEV-1. Pkt. 30c citiata.

SIEV-1. Pkt. 3
flowers of old rose and cream follow
by plumy seed heads. A plant of a
grassy meadows in the Rockies, eas
grown in the rock garden in full s
or light shade, likes a fair amount
moisture, HP, 6-18 inches.

SILENE (sy-LEE-nee)

Catchfly. Annual, biennial and perennials of the Pink Family, in all forms in many species. Many are showy and of value in the garden or rock garden. If seed of the annuals is sown in the fall much earlier flowers will be secured.

SILE-8. Pkt. 25c -acaulis. -alpestris flora pleno. SILE-9. Pkt. 25c -armeria pendula. SILE-1. Pkt.
Double Mixed. A smooth plant
lusters of rose and white flowers;
ept. Sow seeds in position in late
r early spring, 20-in. SILE-1, Pkt. 10c

---compacta, Peach Blossom, SILE-2 Pkt. 15c

Dwarf Double. Soft hairy foliage and
flesh colored flowers in graceful drooping racemes, mid-summer, 10-in. SILE-3.

-New Art Shades. Pkt. 15c Dwarf Double. A splendid mixture containing all the new colors; a choice rock garden strain.

-White. SILE-4. Pkt. 10c Lobel's Catchfly. Hardy annual, 6-in. n pure white.

fortunei. Bright rose, perennial best grown as a ardy annual.

SILE-7. Pkt. 50c One of the loveliest of all rock garden plants, not as easy as most Silenes but not really difficult; large salmon-pink flowers, heavy to light soils with humus and grit, ground cover, sun or light shade, up

—schafta.

Perennial, rosy-purple flowers, trailing habit; pretty border or rock plant, 6-in.

SILLA

-Mixed Colors. SILL-1. Pkt. 30c Hispanica and Campanulata, Mixed, pink, white and blue flowers. SILL-1, Pkt. 30c

SISYRINCHIUM

(sis-i-RIN-ki-um)

Blue-eyed-grass. American grass-like perennials with small blue or yellow flowers. Very attractive in colonies in an open rather moist spot or wild garden; have fibrous roots and transplant easily and easily grown from seed.

—californicum.

SISY-A. Pkt. 25c.

SISY-2, Pkt. 25c —angustifolium. grandiflorum. SISY-1. Pkt. 50c

The finest of the N. Am. grass flowers, a fine rock garden plant for sun or light shade and this will withtstand summer drought, HP. SISY-3. Pkt. 25c Forms large clumps and resembles an is when not in flower; flowers creamy ellow, blooming over long time, stems ft. Attractive specimen plant.

SMILACINA (smy-lah-SY-nah)

Perennial woodland plants called False Solomons Seal. (Lily Family). They have creeping root stalks, leafy stems and small flowers in terminal clusters followed by red of greenish berries. Easily colonized in the wild garden.

—stellata. SMIL-1. Pkt. 20c Wild Lily-of-the-Valley. Pretty white flowers, 8-12-in. tall, May-June. Found in the north-western states.

SOLANUM (soh-LAY-num)

A very large genus, the species most of interest having colored berries which are very decorative; they usually are grown as pot plants for winter use. Commonly known as Jerusalem Cherry.

-capsicastrum nanum. SOLN-1. Greenhouse plant, 15-in. tall, having small red ornamental fruits.

——Clevelandi. SOLN-2. Pkt. 20c
A select variety of Jerusalem Cherry, nice foliage and bright fruits, for pots.

---Hlavacek's Masterpiece. SOLN-3. Pkt. 20c Compact variety, 15-in., bright berries. --- Henderson, New Paterson, SOLN-4.

Pkt. 20c Upright, orange-red, compact, 12-in.

SOLN-5. -ciliatum macrocarpum. Pkt. 25c Scarlet fruits. SOLN-10. Pkt. 35c -nigra. SOLN-6. Pkt. 20c racemigerum. Red Current Tomato. SOLN-11, Pkt. 25c -verbuscum.

SOLDANELLA

-Mixed Solanum.

(sol-dah-NEL-ah)

All species and varieties mixed.

Perennial plants of Primrose Family have a nodding blue, violet or white fringed owers, native of Alps. Plant in moist aday places in rock garden.

Calpina. SOLD-1. Pkt. 25c roundish leaves and

Grows 6-in. tall, round pale blue fringy flowers.

SOLIDAGO (sol-i-DAY-goh)

Erect perennials, with golden yellow Goldenrod Flowers. The Goldenrod is a very common and popular flower, it be-ing the state flower of Nebr., Ky., and Ala. SOLI-I. Pkt. 20c

Tall Goldenrod. A western Mont., compact flower clust flowers, 1-3-ft. tall, July-Aug. A western species from flower clusters, yellow SOLI-2. Pkt. 20c

-missouriensis. Dwarf Goldenrod. Western species, yel-w flowers 6-8-in. tall, flowering June-Aug.

SOPHORA (soh-FOH-rah)

Showy when in bloom and of ornamental value can be grown from seed.

Mostly deciduous trees; very showy when in bloom and ornamental on the awn; most are too tender for the N. but hey make fine specimens in the S. Thrive n well drained sandy loams. SOPH-1. Pkt. 35c -mollis.

—tomentosα, SOPH-1. Pkt. 50c Ornamental shrub 5-7 ft. with racemes of showy yellow flowers, native of Texas. SOPH-2. Pkt. 50c —secundiflora. SOPH-2. Pkt. 50c
Mescal-bean Not hardy North; fragrant
violet-blue flowers, 1 inch long; seeds are
poisenous if eaten.

SPHAERALCEA

(sfee-RAL-see-ah)

Globe Mallows, Warm region plants and shrubs grown in gardens for their red and violet flowers. The flowers are mallow-like.

rivularis. SPHA-1. Pkt. 20c Wild Hollyhock. This is good in the order, a western species, pink flowers, border, a we: 3-5 feet, June.

SPRAGUEA (SPRAY-ge-ah)

Pussy-paws. Small alpine prants with coseties of thick fleshy evergreen leaves and heads of fluffy pink flowers on short nearly prostrate stems. For the rock gar-ien in very light shade.

This seems to be the only known species; from the mountains of the N.W., light sandy soils with trace humus; flowers pink to dark red, for rock garden, 1" tall, HP.

STATICE (STAT-i-see)

Sea Pinks, Thrift. Consist of dwart perennial plants much used in rock gardens and for edging; included are those formally classed under Armeria (ahr-MEE-ri-ah), but the plants usually called Statice as grown in gardens and by floriets are Limonium, which see. They are easily grown in ordinary garden soil.

-armeria, Yar. alpina. STAT-1. Pkt. 15c A bright rose perennial, foliage a compact tuff, for cutting or border; does best in dry sandy soil and sun; flowers are on stiff wirry stems above foliage tipped with dense globe-shaped flowers; May-June; HP, 6-in.

STAT-9, Pkt. 25c -caespitosa. True variety. Charming for a crevice in the R.G. in sumy position; compact tiny growth to 2", short dark green leaves, pure pink flowers, HP.

STAT-7. Pkt. 15c A dwarf species for the sunny R.G. with sparys of pale lilac flowers, 6 in., HP.

-formosa Hybrids. STAT-2. Pkt. 15c Deepest to lightest rose shades of pink, coral and light reds, charming mixture, perennial, 1½-ft.

-Ameria formosa hybrida. STAT-2T. Pkt. 25c

Large flowers in many shades, HP, welcome.

Giant Pink.

Giant Pink.

Glear rose pink flower 2-in. across, borne foliage and bright yellow larger foliage and bright yellow lowers.

Giant Pink.

STAT-3. Pkt. 20c

Clear rose pink flower 2-in. across, borne freely on straight strong stems, 1-ft. to larger foliage and bright yellow larger foliage and bright yellow larger foliage.

-Large Flow. Hybrids. STAT-4. Pkt. 20c The largest and best hybrids, 1½-ft. -perezii. STAT-8. Pkt. 25c blue yet -perezii.

-tatariea. ST.
Perenniail, rose colored. STAT-5. Pkt. 15c

—Statice Blend. STAT-6X. Pkt. 10c All species and varieties. —Six Hills Hybrids. STAT-10. Pkt. 25c STRELITZLA (stre-LIT-si-ah)

Bird of Paradise. Plants of Banana Family with showy blossoms borne in rigid bracts. They are tender subjects and must be grown in the N. as tub

STRE-2. Seeds 30c each STRE-1. Seeds 25c each -regina. Beautiful flowers resembling birds in flight gaily colored deep blue and orange, banana-like follage and lovely subject for conservatory doing well in large tubs or pots, also outdoors in mild climates.

STREPTANTHERA

STRT-I. Pkt. 25c Brilliant cape bulb with foliage like ritonia, flowers brilliant orange-red with tolet eye; hardier than Freeias. STOCKS, See Matthiola.

STREPTOCARPUS

(STREP-toh-kahr-pus)

Cape-primrose. Choice herbaceous plants akin to Gloxinia and Saintpaulia, usually stemless with showy blue or purple flowers and broad basal leaves; easily grown sown in Feb. in a cool greenhouse producing blooming plants the following winter. They are grown as an indoor pot blant.

-orchid flowered. STEP-2. Pkt. 35c

STYRAX (STY-rax)

Deciduous and evergreen shrubs and trees native of the warmer regions; they are very attractive in habit and with showy white flowers in clusters or racemes. Do best in light and well drained soil; a few are hardy in the North. They make pretty shrubs and lawn specimens. SOLN-7X. Pkt. 15c

STAX-1. Pkt. 30c

SWEET PEAS

We list the top varieties in Sweet Peas and while many fine varieties are offered under many different names, we adhere strictly to the introducer's name; by trials ourselves and many reports from our customers in all sections of the country as well as very extensive trials by our Sweet Pea growers in California, we are able to discard the varieties that have been surpassed by newer introductions and we are positive that, if your varieties are selected from the list we present, you will have the best varieties one could possibly secure.

The best varieties one could possibly secure.

A hardy annual climber requiring rich deeply worked soil containing clay but with good drainage; sunny situations are best but not exposed to hot dry winds during the summer. It is better if the soil can be manured and worked in the fall so that the soil will be in good physical condition in the spring; 1½-2-ft. is not too deep to work the soil in the fall. Sow seeds as early as possible, 2-in. apart and 3-in. deep covering with but 1-in. of soil and then gradually filling in the other 2-in. as the plants grow; some sand mixed in the top soil, especially with the white seeded sorts, will help. Thin plants to 3-in. apart. It is important that the support given the vines be rigid at the bottom so that the wind will not be able to tear the roots or disturb them by jerking the supports. Keep flowers picked for best bloom.

SPENCER VARIETIES:

SPENCER VARIETIES:

Charming.

Golden cerise.

The most popular type for garden use and will produce the prettiest flowers; while all other types have their good points, the Spencers will satisfy most growers. We list a selection of the very best varieties here, each in its color classification, and we feel sure you will have little chance of finding better ones.

Prices: All Spencer varieties:
Pkt. 10c; oz. 30c; 1/4 lb. \$1.10 Barbara. SPEA-1, Pkt. 10c A fine salmon.

Bonny Briar. Beautiful rose-pink, large flowered SPEA-3, Pkt. 10d Beautiful light blue, long stems and o vigorous grower SPEA-4. Pkt. 10c

Flagship. Deep navy blue, large sized flowers and perfect form, artistically placed on long strong stems, a Silver Medal winner, Scot. Nat. S.P. Soc.

SPEA-6. Pkt. 10c Orange scarlet 'cerise. SPEA-7. Pkt. 10c

SPEA-8. Pkt. 10c

Grand Slam. SPEA-9. Pkt. 10c Bright scarlet-cerise shaded orange, sun-proof, a showy color of great appeal both for garden display or for cutting. SPEA-10. Pkt. 10c Loch Lomond. Maytime. SPEA-11, Pkt. 10c

Patricia Unwin. SPEA-12. Pkt. 10c Beautiful golden salmon on cream ground color, beautiful. Pinnacle. SPEA-13. Pkt. 10c Rich deep rose-pink with a touch of white near the base, stems unusually

long and strong.
Crimson scarlet, fine.
Salmon shrimp pink. Snow White, SPEA-16, Pkt. 10c Smiles. SPEA-15. Pkt. 10c

Red Supreme. SPEA-17. Pkt. 10c Deep crimson. SPEA-14. Pkt. 10c Rubicund.

is as near perfect as possilbe to secure. Solid paper white with no pink tinge; black seeded, flowers as large as Gigantic. 2-3-ft. tall. SPEA-17. Pkt. 10c Sunkist.

Cream, picotee, edged rose SPEA-20. Pkt. 10c Silvery pink. Welcome. SPEA-21. Pkt. 10c

SPEA-22. Pkt. 10c Fine clear mid-blue, immense flowers strong stems, the strongest growing clear blue yet introduced.

scarlet-vermilion;

White, pink picatee. SPEA-23. Pkt. 10c

-Saier's Special Blend. SPEA-23X. Pkt. 10c; oz. 30c; 1/4 lb. \$1.10

This blend is strictly a hand made blend of the above varieties and in correct proportion as to color blend. Where a small planting is made, this is the ideal blend as it contains just enough varieties so that you will have a full color range for cutting. It is also a collection of all the outstanding varieties so far introduced. It is the last word in Spencer Sweet Peas.

-Gold Medal Spencer Blend, SPEA-24 Pkt. 10c; oz. 25c; ½ 1b. 95c
This is a formula blend which contains over 75 standard varieties and in addition all the best novelties of the past year from one of the large trial plantings; color blend

-Early or Winter Flowering. SPEA-27. Pkt. 20c; ox. 40c; ¼ lb. \$1.40
Choice Mixed. This type is earlier than the Spencers and has been grown in the southern sections of the country due more to its earliness; it is also grown exclusively in greenhouses for winter flowers, however, it does as well outdoors in the North. This is a well balanced blend of the newest and brightest colors.

-Cupid, Bo-peep. SPEA-28. Pkt. 10c Low compact plants for bedding or ders, blooming in June until frost, called Bedding Sweet Peas; color pir—Ruffled Spencers, Mixed. SPEA

Pkt. 10c; oz. 30c; 1/4 lb. \$1.10

The unusual duplexness and extra frilliness of the flowers gives this type a double appearance; they are very pretty.

—Spring Flowering Mixed. SPER-26.

Pkt. 15c; oz. 40c; 1/4 lb. \$1.40

Pkt. 35c
Pkt. 35c
tremely long stout stems and a heavy crop of flowers over a long season. Adapted both to outdoor and greenhouse growing. It is especially recommended for the midsections of the country and in the South where Sweet Peas are grown, and where the heat makes it impossible to grow the

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SWERTIA

Related to the Gentians but quaint rather than showy flowers; give the same treatment as Gentians; slow from seed.

-multicaulis. Perhaps the best with large flowers of clear yellow to blue, 6 inches or less tall. SWRT-2. Pkt. 50c -speciosa.

SWRT-3. Pkt. 50c -bimaculata. SYMPLOCOS (SIM-ploh-kos)

Sweet-leaf. Deciduous and evergreen shrubs and trees, native to the warmer parts of the earth, few of which are hardy in the North, but most can be grown outdoors in the South. SIMP-1. Pkt. 25c -theafolia.

TALINUM (tah-LY-num)

Flame Flower. Genus of Purslame Family comprising many small fleshy perennials with erect clusters of pink, red or yellow flowers. Some are hardy rock garden flowers. Some are hardy rock garden subjects, others must be grown indoors in

—paniculatum. TALI-1. Pkt. 20c Coral Flower. A distinctive and very fine annual garden flower having many slender stems bearing hundreds of little 5-pointed stars of luminous rosy pink followed by airy long hanging capsule-like polished coral heads; fine for cutting and for house plants; sow after soil is warm; a single plant can throw as many as 30 great bright plumes; foliage is decorative, sow in position, 2½-ft. -paniculatum.

TALAUMA (ta-la-YU-ma)

Tender evergreen trees of the Magnolia Family, rivalling them in beauty. Hardy in the South only, they will require a warm greenhouse in the North, with the same cultural needs as Magnolia.

TALA-1. Pkt. 50c Cup-shaped flowers with spicy fragrance, purplish blue sepals and white petals, fully six inches across. One of the most beautiful flowering trees, with large leathery leaves. 50 ft.

TEPHROSIA (tef-ROH-si-ah)

Members of the Pea Family with ash-colored foliage and clusters of a few red, purple or white pea-like flowers. TEPH-1. Pkt. 35c

THALICTRUM (thal-LIK-trum)

Meadow rue. Perennial plants of the Meadow rue. Perennial plants of the Butternut Family, some very decorative in the border and others for the wild garden. Foliage is attractively cut; flowers in numerous large clusters, without petals but with large drooping stamens and sometimes showy sepals. They combine well with plants like Peonies and Iris. Easily grown in light, rich, loamy soil; few natives in moist swampy soil.

-adiantifolium. THAL-1. Pkt. 15c Fine cut foliage, fewer rosy-purple blooming early summer, 2½-ft.

-aquilegifolium. THAL-. Pkt. 40c
One of the most dainty and beautiful of
the race with billowy masses of fluffy
flowers in white, cream or lilac; for cool
moist position in border; sun or light
shade, excellent beside pool or stream,
dandy cut flower, very hardy, 1½-4 ft., HP.

dipterocarpum. THAL-2. Pkt. 15c
Tall late Mooming species with pyramidal clusters of rosy-mature or purple flowers brightened by drooping golden stamens, 4 ft., Aug-Sept., HP.

THAL-4. Pkt. 50c -virgatum. THAL-5, Pkt. 20c

Herbeacous plant, pure white flowers 2'' across, $1\frac{1}{2}$ ft.

-Rose Pink. THAL-6. Pkt. 20c

THERMOPSIS (ther-MOP-sis) Perennial plants of the Pea Family, with a number of lupine-like plants having racemes of yellow flowers. Easily grown in light rich soil, in open sunny position and are useful in the border.

Caroliniana. THER-1. Pkt. 15c Massive spikes of golden yellow flowers, reminding one of Lupins, 3 ft., June-July, HP. THER-1. Pkt. 15c

THUNBERGIA

(thun-BUR-ji-ah) Clock-vine. A genus of some 75 species of tender climbers from tropical regions (Acanthus Family). Several are greenhouse vines, and they can be set outdoors for summer flowering where they do nicely. In the warmer parts of the U.S. they can be grown outdoors. Start seed early indoors.

A slender climber with attractive white gibson.

gibsoni. THUN-1. Pkt. 25c -Choice Mixed. THUN-2x, Pkt. 20c

THYMOPHYLLA

—tonniloba. THYM-1. Pkt. 20c
Dahlborg Daisy. Pretty everblooming plant grown as an annual and unsurpassed for close edgings, bedding or rock garden filler. Myriads of tiny daisyblossoms in a gold tone, over mounds of aromatic fern-foliage; sow early, 6-in. tall. Also grown as a perennial pot plant. -serpyllum album. THYM-2: Pkt. 25c

THYMUS (TY-mus)

Thyme, Aromatic plants with a pro-fusion of small flowers in summer: All like sunny dry locations and are easily grown from seed which germinate readily;; in heavy soils they are liable to winter kill.

THYM-1. Pkt. 30c -mastechinus. Highly aromatic from the Sierra Nevada

TIGRIDIA (TY-grid-i-ah)

Very beautiful bulbous plants with 3-betalled flowers that form a shallow bowl surrounded by 3 triangles; easily grown from seed which occasionally flower the first year, treat like Gladiolus.

-pavonia, Mixed Colors. TIG-1. Pkt. 39c winter. They are grown as an indoor pot plant.

A remarkable new intermediate season type, exhibiting strong heat resistance in open from Wash, south; sandy soil, full combination with vigorous growth, ex
| STEP-1. | Pkt. 15c; or. 40c; 1/4 lb. \$1.40 |
| Best known of the several species, very showy and variable in color; hardy in open from Wash, south; sandy soil, full support the several species of the seve

TITHONIA (ti-THOH-ni-ah)

Natives of Mexico, called Mexican Sunflower and belonging to the Daisy Family. They are robust growers and annuals. Plant out after danger of frost is past.

-Avalon Hybrids. TITH-1. Pkt. 15c An early strain that blooms by end of June from seed sown in position; color orange-topaz to burnished over-sheen of scarlet flame.

A brilliant scarlet, 6-9-ft. TITH-2. Pkt. 15c

- Orange Vermilion. TITH-3. Pkt. 15c Glistening orange-scarlet flowers li large single Dahlias; for background cutting, 6-9 feet.

TORENIA (toh-REE-ni-ah)

Annual and perennial plants of Figwor Annual and perennial plants of Figworl family bearing 2-lipped flowers resembling small Gloxinias. Native of tropical Asia and Africa, they are treated as annuals in N. or grown in the greenhouse. In Fla. they are used as the Pansy in the N. They thrive in partially shaded places and require regular watering. Set plants out after frosts are past and ground warm.

—fourniere.

While they are perennial they are best grown as annuals in the North; used much as Pansies are in the North, doing best in partial shade, along water course or in sandy soils if well watered; flowers rich blue with golden centers, very free, excellent for pots, beds, window boxes, 9-in.

TRACHELOSPERMUM

(tray-kel-oh-SPUR-mum)

Star-Jasmine. Genus of S. Asiatic ever-green vines with fragrant white flowers. ---fragrans. TRAC-1. Pkt. 40c

TRICHOSANTHES

TRIC-1. Pkt. 15c Snake Gourd. Annual climber with white

TRICUSPIDARIA

(tri-cus-pi-DAY-ri-ah)

(Crinodendron). Chilean trees or shrube for greenhouse culture except in the South flowers are borne singly.

Very attractive with drooping scarlet urn-shaped flowers, fairly hardy in g sheltered position.

TRIPTERIS

Golden yellow flowers with black disk, hardy annual, 2-ft., a pretty and airy So. Af. daisy, easily grown, sow seeds early in the spring.

TROLLIUS (TROL-i-us)

Globe Flower. Perennial plants with lobed and cut leaves and flowers resembling large double Buttercups and belonging to Buttercup Family. They naturally grew in swampy places but can be grown in reasonably good garden soil that is not too dry, May-July.

TROL-2. Pkt. 40c A very rare but quite easy species for the rock garden, happy in rather heavy soil with plenty of moisture, in full sun. They have 2 inch buttercups of brilliam golden yellow in late spring and borne singly on short stems above a tuft of deeply slashed leaves. Seed is much easier to germinate than that of most Globeflowers, but should be socked in warm water for 24 hours before sowing HP, 6 inches.

Creamy white flowers, 4-20-in. tall, flowering May-June. A western species from Montana.

TULBAGHIA

— violacea.

Beautiful umbels of clear mauve flowers on 24" stems, in S. nearly always in bloom.

TULIPA (TEW-li-pah)

There are great many wild species of Tulips that are greatly admired by fanctors, especially for the rock garden and some of these have been used in breeding the newer strains of border varieties. Many of the species are rather small in both plant and flower but some have the largest and most brilliant blooms of the entire genus, with some having several flowers to the stem. Seed requires several weeks to germinate and should be sown early in pots or carefully prepared seed and provided the return of the strain of the strain produce more compact masses of up-standing flowers over the entire plant than any other strain.

Geranium-pink. VERB-14. Pkt. 20c early in pols or carefully prepared seed beds, several years are generally re-quired for the bulbs to reach blooming, size but in this way a collection of rare and expensive kinds can be acquired at little expense.

—biflora. TULP 2. Pkt. 50c

A small early species for R. G. constem bearing 3-4 small star-like flowers in white or yellow; easily grown from seed, 5 in., HB.

-chrysantha. TULP-4. Pkt. 50c -sprengeri. TULP-3. Pkt. 50c Bright red flowers, funnel-shaped in bud easily grown and the last Tulip in flower;

Narrow buds open to widely expanded flowers, the outer segments flushed with carmine, the inner white, blotched yellow at base; close to lovely T. clusiana, and quite rare. Likes light sandy soil in sun and fine for rock garden or border, HBb, 6-16 inches.

UNIOLA (eu-NY-oh-lah)

Spike Grass. Native perennial grasses. Some species are grown as ornamental

UNIO-1. Pkt. 150 Perennial, 5-ft., pretty in the border.

URSINIA (ur-SIN-i-ah)

Mostly hardy annuals having datay-like flowers in orange shades on long wiry stems standing 2-3-ft. above low tufts of finely cut foliage; plants bloom profusely in mid-summer to late fall making a colorful addition to the sunny border; they can be potted up for winter bloom indoors.

Hybrids. USIN-2. Pkt. 15e
Pretty yellow and orange shades.

VACCINIUM (vak-SIN-i-um)

it included plants known as Blueberry, Cranberry, Cowberry, Wortleberry, etc. Some are grown for their ornamental foliage and others for their fruits. They are easily grown from seed and require a lime free soil, thriving best in a sandy, moist peat soil.

VACC-1. Pkt. 25c

VALERIANA

(vah-lee-ri-AY-nah)

Hardy plants with small white or rose flowers in spikes or flat-topped clusters; easily grown and valuable for garden effect or for cut flowers. Known as Garden Heliotrope on account of its fragrance; they are excellent hardy border plants.

rubra, Mixed. VAL-1. Pkt. 15c Perennial alpine species in White, rose

VANDA (VAN-dah)

Beautiful tropical epiphytic orchids, having racemes of fragrant white, lilac, blue or greenish flowers, usually with sacs or spurs; they require a high temperature and humid atmosphere during the growing seriod, during the winter a drier and scoler place and exposed to the sun. See Orchids.

VAND-1. Pkt. \$1.00 Elue Orchid. Light blue flowers, 4 inches across in erect racemes, 18 inches tall; from the Himalayas.

VELTHEIMIA (velt-HY-mi-ah)

Bulbous plants of Lily Family with sword-like foliage in basal rosettes and tubular drooping flowers in dense terminal clusters; easy culture, in greenhouse in Nor outdoors in S. Rich fibrous soil with charcoal and sand best for growing the bulb.

VELT-1. Pkt. 25c Well adapted for pot culture; 40-60 reddish tubular flowers 1½" long; ideal rock yarden plant in mild sections.

VENIDIUM (ve-NID-i-um)

Hardy annuals and perennials allied to

the Arctotis; their brilliant orange or yel-low flowers suggest small sunflowers; they are valuable in the garden or green-house as a color accent and are valuable cut flowers. Generally grown as annuals by starting the seed indoors; space a foot apart, in sunshine and well drained soil.

calendulaceum.

2-in. single golden yellow flowers with black centers, hardy annual, 10-in.

-iastuosum, Golden Orange. VNID-2. Beautiful golden orange flowers with dark centers 4-in. across, silky gray foliage, 2-ft.

VNID-3. Pkt. 200 Double rowed Daisies with 3-4-in. flowers in pastel colors of cream, primrose, buff, lemon, orange, usually with irregular zoning of brown, blue or black, 2-ft.

VERBASCUM (ver-BAS-kum)

Thrive in full sunshine and hybridize eadily with the genus Celsia, producing namy new color forms. As a rule they nake good specimen plants in the backround of the hardy border, ighly recommended Swiss strain.

phoeniceum Hybrids. VEBS-1. Grows 5-ft. flowers with prominent purple stamens. The hybrids are beautiful and come in a varied combination. Peren-

VERBENA

Perennial in the South but grown as hardy annuals in the North, sowing seeds indoors and transplanting outdoors in May, 1-ft. apart, or seeds can be sown direct in April or May, blooming in mid-summer. Colors pink, rose, red, lavender, blue, purple and white, thriving in poor soil and withstanding drought well.

HORTENSIS (Garden Verbena).

VERB-13. Pkt. 20c Another Heinemann introduction, dark blue with white eye, the blue being a select shade for Veberans, for mixed border, 2 ft., HP.

VERB-14. Pkt. 20c

A new strain from the German grower, Heinemann, a beautiful geranium-pink with white eye.

Hybrids gr. fl. VERB-2. Pkt. 15c. 1/4 oz. 60c Mammoth, Choice Mixed. Robust spreading growth, plants often 2-ft. across, flowers 1-in. across, quick to come into

-gr. fl. Beauty of Oxford. VERB-3

Pkt. 15c: ¼ oz. 75c

Hybrids, a beautiful giant strain in
hades of rose-pink to rose-red, brightest,
roduced from plants with the florets 1-in.
cross. -Verbena Blend. VERB-4X. Pkt. 15c;

A blend of all the giant flowered annual Verbenas, including those above.

VARIOUS SPECIES:

abyssinica VERB-12. Pkt. 50c -aubletia compacta. VERB-5. Pkt. 15c A new variety, dark violet-red, 10-in, high, blooming end of June till frost, hardy annual.

— purpurcarmin. VERB-6. Pkt. 15c Large flowered, 15-in. tall, blooming end of May till frost, dark carmine.

-bipifinatifida. VERB-7. Pkt. 15c Blooms June till Nov. continuously in showy blue-layender clusters; ferny, feathery foliage, usually winter hardy perennial but so quick it may be treated as an annual.

bongriensis. VERB-8. Pkt. 15c 3-ft. high, a new Swiss type, fine for cut flowers, highly recommended.

cut flowers, highly recommended.

— Tobaty Variety. VERB-9. Pkt. 20c
By far the best and showiest strains of
this species, coming from the Arroya
Tobaty of Paraguay; compared with the
usual strains of this species, it is more
floriferous, the trusses heavier, more massive and compact; blooming season covers
several months, color soft bluish-lavender;
speciagular in the horder, 3-tt. Deciduous shrubs and trees native of several months, color soft bluis the colder parts even to the Arctic Circle; speciacular in the border, 3-tt.

-Venosα. VERB-11. Pkt. 15c Compact purple clusters, 10-in. tall, perennial grown as an annual.

VERBESINA

VEBE-1. Pkt. 20c 40-in. Butter Daisy. A showy and easy annual, quick from seed, that doesn't seem to know when to stop blooming. Big butter-yellow daisies with wide jagged petals and tufted cushion centers, yellow also. It cuts.

VERONICA (ve-ROH-i-kah)

Annuals and perennials highly useful in the border and rack garden; hardy, free flowering, thrive in an open sunny position or light shade, easily grown from seeds.

-altissima. VERO-3. Pkt. 25c -armena. VERO-4. Pkt. 25c -fruticans (saxitilis). VERO-5. Pkt. 25c saturoides.

VERO-6. Pkt. 25c spicata enziana. VERO-6. Pkt. 25c VERO-2. Pkt. 15c Blue or pink flowers in spike-like racemes, 1½-ft., perennial.

VIBURNUM (vy-BUR-num)

Deciduos and evergreen shrubs and trees widely distributed in the northern hemisphere; they are among the most ornamental and useful shrubs and make good shrubbery plants in the shrub border. Their foliage is especially beautiful in the fall; flowers are showy and followed by attractive fruits. Sow seeds when ripe or stratify them when received.

-coriaceum. VIR-2. Pkt. 25c -erubescens. VIB-1. Pkt. 25c -nervosum. VIR-4. Pkt. 25c VIB-5. Pkt. 15c —stellulatum. VIR-3. Pkt. 25c

VINCA ROSEA (VIN-kah)

Madagascar Perwinkle is a tender perennial grown in the North as an annual. It is a good garden subect with rosypurple flowers and used in parks as a bedding plant with good effect; sow seeds early in a warm greenhouse and try to transplant several times before setting out. Sun or partial shade.

Pure White. VINC-2. Pkt. 10c VINC-3. Pkt. 10c VINC-4X. Pkt. 10c -Crimson. -Mixed.

VIOLA

The genus includes a number of species of small, mostly perennial, plants having attractive blue, white, lavender or yellow spurred flowers in early spring or summer. The Pansy is the best known (see Pansy). Violets are second in popularity. All are propagated by seeds. They like sunshine but not the hot kind.

CORNUTA: Flower with very long spur, and called Tufted Pansies or the garden Viola. They are very pretty for edging the border or for ground cover under trees. Grow very much as you would Pansies. Bicolor. VIOL-1. Pkt. 25c (V. papilio). Light victor-blue, very pretty.

-Blaue Schonheit. VIOL-3. Pkt. 25c A new large German variety in pure clear blue, highly recommended.

Orange Triumph. VIOI-4. Pkt. 25c A new blend of new colors in Violas, -Above Varieties Blended. VIOL-6X.

-Nigra, Black Imp. VIOL-7. Pkt. 25c Quaint little pansy-flowers that seem to have been nipped from black velvet, exceedingly floriferous, comes true from seed, 3 months to bloom; treat as an an-

-Scotch Hybrids. Extra choice bedding Violas that are highly recommended, and long stemmed flowers. An outstanding variety.

S. & G. Special Blend. This is the best blend of Violas grown by one of our Netherlands growers and of which they highly recommend.

-W-F Special Blend. VIOL-11. Pkt. 35c Pkt. 25c

This blend of bright gay colors far surpasses any mixtures of Violas we have ever seen. The bright shades of self colors of red, yellow, blue and apricot combined with many shades which are blotched make these a supreme mixture.

—αdunca. VIOL-15. Pkt. 25c VIOL-16. Pkt. 50c -douglasi.

VIOL-14. Pkt. 50c Pretty rock garden Viola with yellow flowers and purple reverse; gritty loams, sun, 4" tall, HP. -glabella. VIOL-17. Pkt. 25c

saxatilis. Dawnside Sirain, Johnny-Jump-Ups. Color selections of Viola saxatilis. Little "pansy" flowers in extraordinary profusion from late spring to late autumn. Range of color variation exceedingly wide, not easy to lind two plants with flowers alike. This strain seems to withstand summer heat rather better than do Johnny-Jump-Up strains selected from Viola tricolor. Best treated as Annual. VIOL-12. Pkt. 25c treated as Annual.

-halli. VIOL-18. Pkt. 50c -praemorsa. VIOL-19. Pkt. 50c -sarmentosa (V. sempervirens).

VIOL-20. Pkt. 50c Blend of all Violas. VIOL-13X. Pkt. 20c This is made up of all the above and other varieties.

VIRGINIA STOCKS. See Malcomia. VISCARIA (vis-CAR-i-ah)

Start indoors in March or April, germ, inating them warm and in light, nana compacta, Fiery Red. VISC-9.

Pkt. 10c -nobilis. VISC-9. Pkt. 20c oculata, Loyalty. VISC-6. Pkt. 10c
Graceful plants 1-ft. high bearing during the summer large showy brilliant
flowers each with a dark center.

-- Rose Beauty. VISC-7. Pkt. 10c -Best Mixed. VISC-8. Pkt. 10c WAHLENBERGIA

(wahl-en-BUR-ji-ah)

A genus of small annual and perennia plants of Bellflower Family with nodding cell-shaped blue flowers. They resemble lespecially in open and well drained

mareisi, alba. WAHL-1. Pkt. 20c erinoides type. VERB-10. Pkt. 15c Heat resisting plant spreading into a cold and in light. Watter the cold and in light.

-grandiflora. WAHL-2, Pkt. 20c Usually known as Platycodon grandiflorum, the balloon flower; inflated balloon-like buds and blue or white saucer-shaped flowers, 1½ ft., HP.

WALLFLOWER

Cheiranthus (kay-RAN-thus) Cheiri. A genus of perennials some of which rank among the showlest of the garden perennials. Under this classification are the English wallflowers. Seed should be sown in the eastern part of the country, early in the summer and the seedlings transplanted a couple of times, pinching the tops back to induce bushy growth; the young plants can then be wintered over in cold frames and set out for flowering the next spring; light loamy soil having some lime seems to be best. In mild climates they can be wintered over in the open ground and in the West the annual sorts can be easily grown.

C. cheiri:

Most of the Wallflowers offered here are English grown and from the very best source; they are all high class.

WALL-6. Pkt. 25c Single variety, highly selected stock, fine color, HP, 1½ ft. WALL-7. Pkt. 25c

Popular large flowered, rich yellow variety, HP, 1½ ft. —Early Wonder. WALL-2. Pkt. 15c;
New class of double Wallflower, golden yellow, flaked with green, HP, 2 ft.

yellow, flaked

—Eastern Queen.

Pretty shade of bedder, HP, 1½ ft.

WALL-8. Pkt. 25c

wall-9. Pkt. 25c

WALL-9. Pkt. 25c

Ruby-red, unique and attractive color, HP, $1\frac{1}{2}$ ft. Feltham Early. WALL-10. Pkt. 25c NEW. Fine red-brown color, very early, HP, 1½ ft.

Fireball. WALL-3. Pkt. 15c
This is a new Swiss variety of fiery red
color that is exceptionally good. Peren-

WALL-11. Pkt. 25c Rich orange-red, remarkably fine and effective, HP, 1½ ft.

Goliath. WALL-4. Pkt. 20c The beauty of this variety cannot be excelled even by the double strains.

-Golden Monarch. WALL-12. Pkt. 25c A rich yellow counterpart of our Vulcan, HP, 1 ft. WALL-13. Pkt. 25c

handsome novelty, HP, 9 inches.

Nearest approach to white, a useful contrast, HP, 1½ ft. -Orange Bedder. Rich orange shading to apricot-yellow a striking color, HP, 1 ft.

Primrose Monarch. WALL-15. Pkt. 25c Counterpart to our Golden Monarch, a beautiful primrose color, HP, 1 ft. Ruby Gem. WALL-16. Pkt. 25c

Vulcan Improved. WALL-17. Pkt. 25c Rich velvety, crimson flowers, a great mprovement, HP, 1 ft.

Forcing Annuals Mixed. Pkt. 10c; oz. 70c This is an early annual, suitable forcing, in best color blend, 18-inches.

WATSONIA (wat-SOH-ni-ah)

Related to Gladiolus, Watsonias make dense clumps of long grassy leaves with a profusion of tall stems bearing numerous somewhat trumpet-shaped flowers; much grown in California but little known in the N. In the N. try growing them in pails or boxes that can be taken indoors in a fairly sunny basement during the winter, as they cannot be handled like dry Gladiolus bulbs; they should be tried south of Wash, in the S.

-Van Stavern's Strain. WAT-1. Pkt. 35c Many colors; like graceful Gladiolus evergreen foliage, for mild climates, 5 ft

WAT-2. Pkt. 25c Evergieen, require sunny situations and horough watering; beautiful along streams and pools, bloom late summer and fall stems 4 ft. tall, flowers in all shades of pink, salmon, apricot, orange, red and swen ashes of roses, long lasting when the court of the court o

Evergreen Mixture. WAT-3. Pkt. 25c Over 12 evergreen species in α wide color range.

XANTHISMA (zan-THIZ-mah)

A genus of annual and biennial plants with narrow leaves and yellow ray flow-ers in heads. Suitable for dry open places and seed should be sown where plants are to grow.

—texanum.

"Star of Texas". Annual making the most brilliant showing of vivid sun reflecting golden yellow of any annual flower, no exceptions; continuous bloom from late June till end of Oct; flowers are big, many pointed stars of polished gold, cuts well and withstands heat and drough well, 2-ft.

XERANTHEMUM

(zee-RAN-thee-mum) -annum, Double Mixed. Pkt. 10c; ox. 80c

Easily grown everlastings with white downy foliage and pink, purple and white flowers, 1½-in. across; they are grown mainly for their papery flowers for drying; best to sow in rows in the garden when weather becomes warm, thinning them out later to 6-in. or so apart, 3-ft. tall.

ZANTEDESCHIA

Calla Lily. Sometimes listed as Richardia. Easily grown, requiring light soil with plenty of humus; make excellent pollants and useful for forcing; in Calif. can be left in ground over winter but in the left in ground over winter but in the latest must be lifted and stored indoors.

dethiopica.

Ivory Calla Lily. Large white flowers in 3-4 ft. stems, beautiful dark green foligge, practically evergreen in Calif., plant in moist shady places.

ZANT-1. Pkt. 25c

ZEPHYRANTHES

(zef-i-RAN-theez) Zephyr-lily. Belonging to Amaryllis Fam-y, narrow strap-shaped leaves, and fun-el-shaped flowers on erect stems. The should be planted more. They are beautiful and useful; there are many different forms and some are hardy enough for the North, altho the bulbs should be lifted in the fall and handled like Gladiolus.

ZEPH-1. Pkt. 50c Seed comes from India and is ready during August; sow when fresh.

ZYGADENUS (zig-ah-DEE-nus)

ZINNIAS

Zinnias are warm weather loving plants and should never be sown until the soil has thoroughly warmed up and all danger of frost has passed. For best results, especially with the smaller flowered, early blooming varieties, we recommend sowing the seed where the plants are to flower. The taller growing, large flowered sorts can safely be transplanted, altho they also will make more robust growth and will produce more flowers if they can be planted where they are to remain and when the seedlings are 3-4-in. tall, thinned out to the proper distance. To induce a thrifty, heavy root system, irrigate your plants rather than merely sprinkling them. Dig a little trench along side the rows and let the water run slowly for several hours so that it will seep down deep into the soil and make the plant food available for the plants throughout the mass of feeding roots. Always cultivate after each irrigation to conserve the moisture; by this method you will have to water zinnias only once every two weeks or so, it gives a stronger, healthier plant and saves on the water bill.

DAHLIA-FLOWERED

These were introduced in 1919 and since that time all the best colors have been included. The plants are 2½-3-ft. tall, very robust and bearing many strong stems of fully double, huge flowers which resemble the show type Dahlia.

-Canary Bird. ZIN-1. Pkt. 15c; ox. \$1.00

Crimson Monarch. ZIN-2. Pkt. 15c; Very large flowered deep crimson. Dream. Zin-3. Pkt. 15c; ox. \$1.00

Most unusual deep rosy lavender.

-Exquisite. ZIN-5. Pkt. 15c; oz. \$1.00 Light rose with a deep rose center. Golden Dawn, ZIN-4. Pkt. 15c; oz. \$1.00

ZIN-6. Pkt. 15c; oz. \$1.00 Immense blooms of deep orange, crimson and gold. -Polar Bear. ZIN-7. Pkt. 15c; oz. \$1.00

-Will Rogers. ZIN-8. Pkt. 15c; oz. \$1.00 A lovely brilliant scarlet red.

-Dahlia-Flowered Blend. ZIN-9X. Pkt. 10c; oz. \$1.00 GIANTS OF CALIFORNIA

These were introduced in 1926 and have rapidly gained in popularity. The plants are 3-4-ft. tall with long stems which adapt it particularly for use as a cut flower; the flowers are large and flat giving a graceful effect.

Enchantress. ZIN-10. Pkt. 15c; ox. \$1.00 Golden Queen. ZIN-11. Pkt. 15c;

-Grenadier. ZIN-12. Pkt. 15c; oz. \$1.00 oz. \$1.00 A bright dark red. Lavender Queen. ZIN-13. Pkt. 15c;

Deep rosy lavender. Miss Willmott. ZIN-14. Pkt. 15c;

Large flowers of soft rich pink. \$1.00 -Orange Queen. ZIN-15. Pkt. 15c;

Purity. ZIN-16. Pkt. 15c; oz. \$1.00
Best white in any Zinnia.

Scarlet Queen. ZIN-17. Pkt. 15c; Glowing deep scarlet. -Cal. Giants, Mixed. ZIN-18X. Pkt. 10c;

This is a high class blend of varieties. -Super Giants, Mixed. ZIN-19. Pkt. 15c; A vastly improved strain of the Crown O'Gold type with large well formed flowers in soft pastel shades, each petal overlaid at the base with deep golden yellow.

Super Fantasy. ZIN-20. Pkt. 15c; Flowers are 3-in. in diameter, shaggypetaled and on long stems, making excelient cut flowers. They are strikingly beautiful.

-Harmony Type. ZIN-21. Pkt. 15c: Scabious-Flowered, plants 21/2-3-ft. bearing numerous medium sized flowers, resembling the annual Scabiosa and Hamony Manigold. Bright shades including crimson, scarlet; orange, yellow, pink and white.

-gaillardia-Flavored. ZIN-22. Pkt. 15c: Navajo. Flowers resemble a Picta Double gaillardia, in both form and coloring. Finest mixed, bicolors, mellow tones, fine for cutting, 2-ft.

-Howard's Giants. ZIN-23. Pkt. 15c; A striking new large flowered crested tween the Dahlia-flowered and Harmony types. The plants are 3-4-ft. tall and the flowers large. They come about 80%

Cactus-Flowered Giants. This is an improved Fantasy type with flowers averaging 4½-in. across, plants 30-in. tall.

-Fantasy Types. ZIN-25. Pkt. 15c; Petals are long, curved and pointed, resembling those of the night flowering accuses. However, are 4-in, across and 2-in, other colors.

LILLIPUT, POM POM

They are among the most popular Zin-ias for cut flowers use; the flowers are mall, compact and symmetrical, on strong itemmed 1½-2 foot plants. This strain has beautifully formed double flowers. Black Ruby. ZIN-39. Pkt. 15c

-Crimson Gem. ZIN-26. Pkt. 15c; oz. \$1.00 -Dainty Gem.

ZIN-27. Pkt. 15c;

HERBS - GARDEN AND MEDICINAL

then cooked as a vegetable but the stalks TANSY French which resemble anise-flavored celery, as be eaten raw. Make plantings every to weeks, growth rapid. **Pkt. 15c; Oz. 50c.**

GERMAN CHAMOMILE (KOM-oh-myl) (Matricaria chamilla). Scented foliage and typical daisy-like flowers. Pkt. 20c; Oz. 95c.

(Marrubium vulgare.) An aromatic perennial with woolly white foliage and whitish flowers; used mainly in flavoring candies; plant thrives in dry soil. Pkt. 20c.

(Hyssopus officinalis.) Hardy perennial herb or sub-shrub grown as a culinary and medicinal herb and as an ornamental; grown from seed sown early in spring or late fall, transplant in early summer to 12-13 apart, limy soils best. Pkt. 15c; Oz. 50c.

LAVENDER. TRUE

LAVENDER. TRUE

(Lavandula spica.) Not real hardy in N. and must be protected with a good mulch of straw; they develop their best fro-trance when grown in a dry, light, limy, friable soil in full sun, the soil not too rich. Grown for an ornament as well as for its leaves which are dried, giving off its rich fragrance for which it is valued. Start early in spring indoors or try planting it outdoors in Nov. Pkt. 25c; 3 for 55c.

WORMWOOD

(Artemisia vulgaris). Mug mother Wort. Tall plant with, st purple and leaves fragrant, great and leaves being the parts dried in spikes. Plants are aromatic, and leaves being the parts dried in the control of the protection of the parts of the parts of the protection of th

PENNYROYAL

(Mentha pulegium.) Prostrate growth, small bluish-lavender flowers, grown in herb garden, the leaves being used for their flavor. Easily grown from seed in any good garden soil, a little moist and in full sun. Pkt. 25c.

(Eruca sativa.) Roquette. Used as greens. Pkt. 15c; Oz. 40c.

(Rosmanius officinalis.) A hardy shrubby plant grown chiefly for its anomatic leaves used in seasoning as well as an oil used in medicines. Grows 6 ft. and lasts for years with a little winter protection; prefers dry, well drained soils. Pkt. 25c; Oz.

(Ruta graveolens.) Perennial shrubby plant to 3 ft. with yellowish flowers; has medicinal properties as well as ornamental. Pkt. 25c.

SWEET BASIL

(Ocymum basilicum.) Easily grown tender annual, 1 ft. Leaves delightfully clovescented and used either green or dried in seasoning soups, salads, cottage cheese, chopped meats or sausages. Plant 6-10" apart, thrives in light warm soils. Cut in bundles to dry. Plants can be potted for winter growing. Pkt. 10c; Oz. 45c.

(Salvia officinalis.) Hardy perennial, easily grown; plant early in spring or in Nov. The leaves are dried and used as seasoning in meats, sausages, stuffings and cheeses. Space 2½-3 ft. Pkt. 15c; Oz. 80c.

SCURVEY GRASS

(Cochlearia officinalis.) A small herb of Mustard Family grown for its medicinal properties also as a salad; prefers cool and partially shaded soil. Pkt. 15c.

SUMMER SAVORY

SUMMER SAVORY

(Satureja hortensis.) Hardy annual and very useful culinary herb, the aromatic leaves being used, either green or dried, for flavoring salads, sauces, stuffings, soups and stews. Start seed in pans on account of their small size, transplanting as soon as large enough, spacing 15" apart, thriving in good garden soil and full sun. It is very famous for its flavor in green string beans and should be grown in all beans sections. Pkt. 15c; Oz. 40c.

SWEET MARIORAM

(Origanum marjorana.) Perennial best grown as an anaual in the N.; leaves used green in summer and dried for winter, excellent for salads when green and for seasoning soups; 'meats, poultry and cheese when dried. Seeds are small and best started in seed pan and transplanted out, 12-15" apart. For drying gather leaves just before they flower. Pkt. 20c; Oz. 85c.

(Tanacetum vulgare.) Common Tansy, Perennial to 3 ft., grown in the garden for ornament, in herb garden for its medicinal properties and flavoring, easily grown.

Pkt 15r: Oz. 80c. Pkt. 15c; Oz. 80c.

TARRAGON

(Artemisia dracunculus.) Perennial herb used as a seasoning, especially in vine-gars. This is the Russian Tarragon and not be confused with the French Tarragon, which is reproduced only from the roots Pkt. 20c.

(Thymus vulgaris.) Hardy perennial, growing to 8" tall with lavender flowers, grown both for ornament in border or rock garden and for its flavor, the fresh tops being used in garnishing and the leaves, either dried or fresh, chopped and used in a wide variety of cooked foods. Easily grown in ordinary garden soil, spacing 10-12" apart.

(Artemisia vulgaris). Mugwort or Mother Wort. Tall plant with, stems often purple and leaves fragrant, green above and white beneath, flower heads yellow in spikes. Plants are aromatic, the tops and leaves being the parts dried, perennial. Pkt. 20c.

There are many kinds of herbs, usually started in the spring, which will do even better if the seed is sown in Nov. in the North, late enough so that they do not germinate till the coming spring. Many of the hard coated kinds, those of the Mint Family do best this way, also Salad Burnet. Others, such as Angelica, Chervil, Sweet Cicely, Parsley, Lavender, also can be fall sown.

Kinds that need transplanting anything

be tall sown.

Kinds that need transplanting anyway, should be sown in rows, well marked. Included in this list are: Anise-Hyssop, Lemon Balm, Wild Bergamot, Salad Burnet, Catnip, Hyssop, Lewender, Mountain Mint, Wild Marjoram, Rue, Clary Sage and Thyme.

Thyme. Also Angelica, Borage, Caraway, Cher-vil, Coriander, Dill, Lovage and Sirret can be sown in rows where they are to re-

Many herbs will not be delivered to us till late in the fall or early winter and unless we can fill from 1947 crop seed, some sorts may have to be held till new crop arrives.

ANGELICA (an-JEL-i-kah)

(Angelica archangelica.) A stout herb to 6 ft. growing on low ground and makes a striking picture by side of stream, perennial. Pkt. 20c; Oz. 60c.

(Pimpinella anisum.) Parsley Family e leaves and seeds used for flavoring cookery and also in medicine. Annual 2 ft. and easily grown. Sow seed in pril in rows where plants are to grow April in rows whe Pkt. 20c; Oz. 60c.

BALM, LEMON

(Melissa officinalis.) An aromatic sweet herb of Mint Family, used in seasoning, in liquors and medicine; grows 2 ft. tall, leaves have a decided lemon odor and flavod. Easily grown from seed sownlate in fall or early in spring. Pkt. 20c; Oz. \$1.00.

BORAGE (BUR-ahi)

BORAGE (BUR-chj)
(Borage officinalis), Attractive plant, 18" tall, with pretty sky-blue flowers in clusters, likes by bees. Upper leaves and flowers used in salads, the lower leaves are cooked like spinach; the fresh foliage has a Cucumber flavor and adds a cooling touch to salads. Space plants 2-3 ft. apart, hardy annual. Pkt. 10c; Oz. 50c.

CARAWAY (KAR-ah-way)

(Carum carvi.) An annual or bjennial whose seeds are used to flavor bread, cakes, confections and cheese; edsily grown from early spring sown seeds, where plants are to stand, for two seasons. The young shoots and leaves may be used to flavor salads. Sow few radish seed to mark your row. Pkt. 15c. Oz. 35c.

CARDOON (kahr-DOON) Smooth Spanish (Cynara cardunaulus). Grown for its branched stalks and thick main root, sow seeds early where plants are to grow, in thills 18-24" apart. Water during dry periods to keep foliage tender, in fall treat are blanched by covering with earth and

like Celery and later they will be ready to eat like Celery or Endive. Pkt. 15c; Oz. 90c.

CELERY, SOUP

Plain leaf type best suited for use in flavoring soups, either in green state of dried. Pkt. 10c; Oz. 35c.

CHERVIL (CHUR-vil)

CHERVII. (CHUR-vil)
(Anthriscus cerefolium.) Plain leaf Chervil, of Parsley Family, whose parsley-like leaves are used for flavoring salads. Grows 18-24". Sow seeds in early spring or late fall, in any good garden soil, some shade best and produces leaves for use in 6-10 weeks. Pkt. 10c; Oz. 40c.

CHERVII. (CHUR-vil)

(Anthriscus cerefolium.) Curled leaf Chervil. Similar to the plain leaf Chervil, except the curled leaves can be used more for garnishing, similar to curled Parsley. Pkt. 10c; Oz. 40c.

CHIVES (Chyvz)

(Allium schoenoprasum.) Perennial developing a thick grass-like tuft and valued for their mild onion-like flavor, the green stems being used in salads, soups, etc. The oftener the leaves are cut the stronger the plant will grow. Sow seeds early in drills in rows 2-3 ft. apart. Pkt. 15c;

CORIANDER (koh-ri-AN-dur)

(Coriandrum sativum.) Annual or bien-nial herb of Parsley Family grown for its aromatic seeds used in flavoring liquors and confections; plants grow 2 ft., plant in confections; plants grow 2 ft., plant in rows 1½ ft. apart, sow seeds in early spring or late fall; the seed heads, which ripen in mid-summer, are dried on canvas and when dry the seeds can be thrashed out. **Pkt. 10c; Oz. 49c.**

CORN SALAD

CORN SALAD

(Valerianella locusta, var., oiltoria.)
Dutch Broad Leaf, Large Seeded. Also
known as Fetticus, Vetticost and Lambslettuce. Grown in early spring or late
fall as a pot-herb or salad; seed sown in
early fall, some 'plants will get large
enough for fall use and the balance with
mulching can be carried over for early
spring plants. Sow in early spring in
rows 12 inches apart; they do not do well
during the hot summer. The leaves are
mixed with mustard, pepper grass or
water cress, as a salad. Ptt. 15c; Oz. 60c.

CRESS (Lepidium sativum.) Pepper Grass Plain Leaved. Annual growing quickly and making the best greens for garnishing and for salads; the richer the soil the better, plant in rows 12" apart in earlies' spring and at weekly intervals till middle of May. Pkt. 10c; Oz. 25c; 1/4 lb. 35c.

Curled or Double Leaved. Makes nicer leaves for garnishing as well as for salads Pkt. 10c; Oz. 20c; 1/4 lb. 35c. -Large Leaf French. A large leaf strain Pkt. 15c; Oz. 25c; 1/4 lb. 40c.

CRESS, TRUE WATER

(Nasturtium officinalis.) Low trailing perennial growing in wet ground and springs, easily grown from seed and best for greens in early spring or fall. Pkt. 20c; Oz. 90c.

(Cuminum cyminum.) A small annual of the Parsley Family, easily grown from seeds; has finely cut leaves and clusters of small white or rose flowers, the seeds of which are used as an ingredient in curry power and for flavoring pickles and soups. Pkt. 15c; Oz. 60c.

DILL

DIL.
(Anethrum graveolens.) Of Parsley Family, grown for its seeds which are used in flavoring of dill pickles. Sow early in spring or late in fall, in rows 18" apart, thinning to 8-10" in the row. When ripe cut the heads, drying them on canvas and then thrashing out the seeds, which can be stored in cloth bags in a dry place. Pkt. 10c; Oz. 20c; 1/4 lb. 35c.

FENNEL, Long Sweet

Double Sunshine Tints. The Cut and Come Again type, in the best pasted shades. Sunshine Tints are richer in color and more full bodied than ordinary types, and include many autumn tints of bronze, golden yellow, apricot and rich rose as well as the regular delicate pinks, creamy yellows, soft flesh tones and salmons. Free flowering, blooms 2½-3 inches across, rounded in shape and on stems of good cutting length. For best results sow seed where they are to grow in moderately enriched sandy loam. Flowers in 50 days continuing thruout the summer. —linaris. -Golden Gem. ZIN-28, Pkt. 15c: oz. \$1.00

Beautiful golden orange color.

-Golden Orange, ZIN-29. Pkt. 15c; -Golden Orange, oz. \$1.00 ZIN-30. Pkt. 15c Scarlet Gem.

oz. \$1.00 ZIN-38. Pkt. 15c -Salmon Rose. -Valencia. ZIN-31. Pkt. 15c; oz. \$1.00

-Pastel Shades. ZIN-32, Pkt. 15c: oz. \$1.00 -Tom Thumb. ZIN-33. Pkt. 15c

Plants 6-8-in. tall, compact, covered with well formed flowers of the Lilliput Type. Color range thru red, orange, yellow, pink, rose and other pastel shades. Excellent for pet plants and border use.

(Continued on Page 22)

The following is part of a list of African seeds expected soon or

New Species

ling of some names.

BARLERIA lupulina

-candicans

-metalandra

-purpurea

---punctata

-eximia

-latifolia

BEUHINIA acuminata

Packets are 50c each.

BRUNSELSIA americana

BAUHINIA priandra

BRACHYCOME retusa

BRACHYCHITON diversifolia

South Rhodesian

ORANGE, dwarf, compact, early flowering single; orange, light yellow stripe, dark center; pretty for edging, etc., l-ft. -Haegeana. ZIN-36. Pkt. 15c

ZIN-35. Pkt. 15c

ERYPHROCEPHALUM zambesi-

-pulcherrima

SUTERA burkeana

-floribunda

-grandiflora

-- phlog flora PYCOMOSPACHYS urpicaefolia

during the winter months. This VERONIA glabra list was phoned to the printer and -melleri mistakes may occur in the spel-

—karomgensis

CONVOLVULUS randii ACACIA decurrens

---sarnesiana --longifolia

-pubescens

GLADIOLUS African species PEPHROSIA pubedcens

ASTROCHLAENA malvacea CLERODENDRON mycroives DYSCHORISPE thunbergifolia PLUMBAGO zeyheri HERBACEOUS PLANTS:

Double Choice Mixed. Small flowers, baving a charm all their own; effective for bedding, making a brilliant display yet having stems long enough to make fine bouquets for small vases and bowls. Contains many attractive colors and combinations, 11½ foot.

-gracillima. ZIN-37. Pkt. 15c Double (coccinea), Red Riding Hood. Compact form and covered the entire season with double scarlet flowers, 1-in. across; they are effective in the border or would make a beautiful hedge, 1-ft.

—dahleaeflora. ZIN-40. Pkt. 15c

This species is from India, double flowers, pale yellow and the seed is rather fluffy and not like common Zinnias; we have no further description at this time. CREEPING ZINNIA.

See Sanvitalia procumbens.

COREOPSIS insecta DELPHINIUM macrocenpron CLEMATOPSIS stanleyi FELICIA hyssopifolia SUCCULENTS: BRYOPHLLUM calycinum KALANCHOE phyrissora -paniculata BULBOUS and TUBEROUS PLANTS:

DIPLODY species ALBUCA melleri -species ANEILMA aqupinocpale BUPHONE dispicha

EUCOMIS undulata EULOTHIA livingstoneia -zeyheri GLADIOLUS melleri -permeabuis

HAENAMPHUS zambesiacus HYPOXIS species LAPEYROUSIA sandersonii LISSOCJILUS arenarius

GLORIOSA superba gybrids

FLOWER SEED BLENDS

FLOWER SEED MIXTURES

The flower seed mixtures which we offer here are all of special value especially for those who wish to grow and observe many different flowers. The most pleasure to be gotten from these mixtures is to sow them in a seed flat or bed and then transplant the seedlings into nursery rows in the garden, from where they may be retransplanted after they reach some size and you can tell what they are; it will also be easier if the seeds are screened to different sizes, which will get the same species into the same group for planting and then too the smaller seeds require different care in the seed beds than the larger ones. Mixtures can also be used to advantage in scattering them over waste areas with assurance that some specie in the mixture will establish itself and thus make the unsightly spot beautiful. make the unsightly spot beautiful.

CALIFORNIA WILD FLOWERS.

MIX.-7. Pkt. 15c; Ox. 60c
A choice blend of native Californian wild
flowers, containing many different kinds;
for general planting.

CUT FLOWER MIXTURE,

MIX-1. Pkt. 10c; oz. 45c; lb. \$4.00

A large assoriment of annuals with long stems, especially suitable for cut flowers and effective as well in the flower border; we recommend them especially to be planted in rows, thinly, in the garden using a few radish seeds mixed in to show the rows for early cultivation, thin plants out as they grow and begin to crowd.

ANNUAL CLIMBING VINES.

ANNUAL CLIMBING VINES.

MIX-2. Pkt. 10c; oz. 40c; ib. \$5.00

Especially interesting and valuable for a long fence and with a proper seed bed made they can be sown in their permanent position. It will be best to plant part of the seed in April and the balance late in May, so as to be sure to have the tender ones growing too, especially if you are unable to tell the seeds apart.

MORAEA zambesiaca CLIMBERS: CLEMATIS thunbergii ASTROCHAENA malvacea ACROCETHALUS sericeus CROTALARIA sericea PODRANEA brycei -nodosa SENECIA macroglossum

SPHEDAMNQCARPUS pruriens VIGNATRILOBA rhynchosia -liearis

-violacia -pandosis

-paretiqolius CALADENDRON capensis CALOTHAMNUS sanguinius

CALPURIA aurea

ROCK GARDEN PERENNIAL BLEND.

ROCK GARDEN PERENNIAL BLEND.

MIX-3. Pkt. 25c; 1/16 oz. 60c

This is a real find for the Rock Garden grower; contains over 300 Rock Garden perennials, many of them ware and difficult to obtain; we recommend the seed being screened to get them into different lots, planting them thinly in rows in a flat and carefully pricking them out as the seedlings form their second pair of leaves. Keep seed flat covered with a pame of glass, being careful to ventilate as the seeds germinate, as many kinds may require a month to germinate.

ROCK GARDEN ANNUAL BLEND.

MIX-4. Pkt. 15c; oz. 85c.

Contains only low growing annuals suitable for the Rock garden; while they can be sown broadcast over a rocky waste and thus making an unsightly spot beautiful, they can also be grown the same as early started annuals and transplanted.

HARDY BORDER BLEND.

Pkt. 10c; ½ oz. \$1.50

Contains over 100 distinct varieties suitable for plants for the perennial border. Sow the seeds much as for Rock Garden Blend growing the transplanted plants in a nursery row till they reach a size suitable for the permanent border.

HOUSE PLANT BLEND. MIX-6. Pkt. 25c HOUSE PLANT BLEND. MIX-5. Pkt. 25c Nearly 100 desirable species, many of them rare and hard to find, make up this blend and all suitable for house plants, a wonderful find for shut-ins and those wishing to grow pot plants; many kinds. Suggest the seed be screened and then the seeds planted in small pots with glass covers, much as recommended in the Rock Garden Blend.

GENERAL MIXED FLOWERS.

Pkt. 10c; oz. 25c; lb. \$2.50
This contains a mixture of about every type flower and especially recommended for sewing broadcast ever waste places, contains all of the common annuals, biennials and perennials.

CASSIA bacillaris

—laevigata -austins

-artemisiodes

-multijuca -floribunda

-spectabilis CEDRELA toons

CEDRATO willmottianum

CERCIS chinensis CETRUM purpurea

CLERODENDRON fallax -nvcrioides

-tricophomum COCOA plumosus thompsonii

CORDYLINE australia

Lawn Seeds

We offer only the very best grades of Lawn Grasses. We suggest that youorder separate grasses, when possible, rather than mixtures, as you will more likely have a more suitable stand of grass for the purpose you wish as well as for the particular soil. The mixtures that we offer from time to time, are made up especially for the season in which they are listed.

Kentucky Blue Grass

This is the most satisfactory lawn grass for the northern part of the country and should make up at least 80% of any sowing. For sowing in March, which is the best time, a 100% seeding can be made. It requires about 21 days to germinate and thus the best stands will be secured when planted early. PREPAID: Lb. 90c; 3 Lbs. \$2.50; 10 Lbs. \$8.00; 25 Lbs. \$20.00 NOT PREPAID: 112 lbs. bags, at 43c per lb.

ANALYSIS: Pure Seed 92.27%; Germination 80%; Inert Matter, 7.04%; Weed Seed .87%; Crop Seed .32%, 2 Buckhorn per oz. Grown in Ky. This lot weighs better than 24 lbs. per bushel and is a very choice lot.

Lawn Red Top

Where a quick growth is wanted for a start and especially on soils that are towards the wet side, Red Top makes an excellent Lawn Grass. It is a fine grass, germinates quickly and can be sown as soon as the ground is ready in the spring. Blue grass should be sown with it for the permanent grass. Red Top has a more pleasing appearance than the Rye Grasses or Timothy, which is often used for a quick growth. PREPAID: Lb. 50c; 3 Lbs. \$1.40; 5 Lbs. \$2.10; 10 Lbs. \$4.00

White Clover gives the lawn a dark green appearance and a velvety texture. It is quick to germinate and can be sown in March, on the snow, as well as later in the spring. It is an excellent grass to plant with Blue Grass and one of its most important advantages is that it gives a green lawn during August when Blue Grass is likely to dry up during a hot dry spell. Sow about 1/4-1/2 lbs. to the square rod on new seedings and half as much for established lawns.

PŘEPAID: Lb. 95c; 3 Lbs. \$2.75; 10 Lbs. \$8.25.

WE RECOMMEND for a general Lawn Grass mixture for sowing on old lawns, for March sowing, Blue Grass, 80%, Red Top, 15%, White Clover 5%. When ordered in 10 Lbs. lots, use the 10 Lbs. rates above for prices.

In The Mail

(Continued from Page 1)

letter she says our catalog is "truly a wish book."

PAUL F. FRESE, editor of that fine publication, the Flower Grower, writes us a very nice letter in which he says he is "rather fascinated with the way you have worked up your seed list. In fact, I have been amazed that you could republish it so frequently. I have always felt that any horticultural catalog is improved by having some personal slant and news and notes included. This you have succeeded in doing exceptionally well." And while on Mr. Freae's letter, we want to mention, too, that the Iris list in our August issue as "Future Iris Favorites" was the list in the Flower Grower. We want to give this credit to them for this extra fine list of Iris varieties. By the way, the Flower Grower seems to be read in about every part of the world; we have had people in Siam, China, Columbia, Brazil, Argentine, Central America, Alaska, and many other places write us to this effect.

MRS. ELIZABETH CRANE of Haverhill, Mass., sends us in a very nice report of Chirita, from her Robin on this genus. She says:

These are very succulent soft perennial herbs found in China, India and Java. Some have tuberous roots while others are fibrous. They grow readily from seed, germinating in 3 weeks. An enclosed glass or wooden case with under heat is a great help in starting the seed as they are very small and great care should be used in sowing them. The following are notes from different reporters: N. Y .. - All the Chirita seedlings have thread like frail looking stems with two tiny leaves. Mass.-Chirita hamosa, the oddest seedling she ever grew; of the first two leaves one grew very large and the other remained tiny, then the tiny one curled under the larger one and finally disappeared and then back on the stalk an inch, 2 more uneven leaves appeared but with not more leaves of uneven size are showing. Colo.-C. lavendulacea is fibrous, has few leaves until it starts to branch, then many leaves and flowers develope; flowers about 2" long, tube white corolla lavender-blue. Stem thick, translucent like Impatiens; the plant is very delicate and pretty. Mass.-Seedlings must be watched carefully and not given too much moisture or they will dampen off; when potted up they should be watered from bottom or care used in top watering, too much moisture around stem is fatal. Mass.- Sowed seed Aug. 31th and now Oct. 1st the seed is germinating. Soil was 1/2 sifted peat and 1/2 good soil, keep in warm place in kitchen. NY Had good germination but many dampened off, she now finds that the lids on all seed jars must be lifted daily for airing, after second set of leaves form, increasing it

Thanks for your very nice report on Chirta, Mrs. Crane. We have seed of several species coming for this seed year and would like to hear from others too.

and double Gypsophilia. As our orders are filed under the states ter, we have not answered her: write again Mrs. Parkinson.

which is the best flower, for me, on future orders within a month

with many hundreds to mention, but this last year the Pansies have been in view just about the entire time. This spring the plantings in our trials, of W-F Special Blend were the showiest and continued right up into August when the hot sun finally got them but right after that the new seedlings began to flower and even at the end of Oct. they still are a mass of bloom. It is hard to say which blend is the best all seem to have such wonderful flowers. The Black Imp Violas are "little imps" all right for they stand up so straight with their flowers bent back just like a little imp would stand.

PENSTEMONS. These as a rule germinate best after a freeze but this summer 24 species were planted in vermiculite and of the 24, 8 germinated readily and to save space will just give the catalog numbers: 81, 69, 58, 72, 71, 78, 77 exra good 79. They were sown June 22nd and germinated about July 18th. However those wanting to start Penstemons should order seed now and plant it in the garden or cold frame so that the seed will germinate in the early spring. This will save a lot of work too.

MRS. A. DANKO of Parma Heights, Ohio, write that she gets 80% germination with our seeds and that some of our seed that flowered this summer were blue ribbon winners.

Mr. E. B. ANDERSON President of the Alpine Garden Society of England writes us that he is exeremely interested in our catalog and that it has no counterpart in

John McDannald of Medesto, Cal., writes "I am so pleased with your paper It is the finest I have ever seen in flower descriptions and pronunciations. I hope I will not miss an issue as it is so instructive and educational. I have over 200 varieties of flowers growing in my garden and enjoy getting new ones." And we hope, Mr. McDannald that future issues will be even more instructive and helpful. May be, some of our readers will send in some short items on their favorite flower, especially as to its behavior and cultural quirements and too, points they have learned in growing it.

Rosemary, that's a pretty name, but not to us any more. Herb seed has been hard to secure since the war and amongst other herb seeds we had contracted, Rosemary was promised to the last moment, in fact after the catalog had listed it and then failed to come in; well, it seems everyone wants Rosemary, and now we have to write each one saying it won't be sent out this spring. And mentioning refunds and that is another unpleasant duty, not that we dislike sending customers remittances back, but to have to make excuses and to disappoint customers who are looking for something we have listed. Small items, 10c-15c, are usually returned with your order, unless we expect seed to still come in; amounts between 15c and 95c are usually each day till cover can be left off. taken care of by refund slips; and are sent. A very few customers dislike these refund slips, and if we knew before hand, we would not send them but the reasons are MRS. C. A. PARKINSON writes these: first checks for less than a us about new crop Delphinium seed dollar are costly and troublesome at both ends, they require being entered all thru the books and with and she gave no address on her let- the shortage of help we have experienced, these refund slips are very easily handled, and just about PANSIES. It is hard to say 99% of these slips are returned

(Continued from Page 1)

the time the sunlight strikes it and the soil kept moist by watering thru a very fine hose.

Sowing is carried out during March or April according to the advance of Spring. The seed germinates in 3-7 weeks and is transplanted when the seedlings are 1/2-2 inches high, according to the species. I transplant in blocks one inch square and separate into individual plants after one season's growth in a sheltered spot.

The Heathers require a limefree soil, with the exception of the Ericas: - carnea, mediterranea stricta and vagans, which will tolerate a little lime. The addition of granulated peat to the soil helps the formation of a good root system and maintains the plants in good condition. - By James W. Porter, Belfast, Ireland.

We are offering seed of the best Heathers for this coming season from the famous plantings of Mr. J. W. Porter and his exhibit at the Belfast Museum and Art Gallery in August evidences the fact that more hardy Heathers are found in Ireland than in any other country.

Many of those shown have been collected and grown by Mr. Porter at "Hillside" whose heather garden is well known to garden lovers. The collection contained over 60 varities, varying in size from a few inches to a few feet; color ranging from pure white thru various shades of pink to deep crimson. An unusual plant shown is a green flowered variety of the Cornish Heather. Six double-flowered varieties were also shown, including Erica Mackayi which was first found in 1869. The foliage varieties include Erica cinerea Pure Gold, found in Cavehill, Belfast, and a bright golden form at Ballymagarrick.

In a later issue we will list several choice species and with full culture information. Seed is available in the following: Erica camea, Mixed; E. Springwood, white; E. alba; E. verellie, E. praecois rubra; E. mediterranea mixed; E. m. alba, tall form; E. m. alba, dwarf form; E. m. W. Rackliff, best white form; E. m. Red form.

Seed Bulbs

(Continued from Page 1) Genus Physalis

We would like to contact anyone in a position to furnish seeds of or information on different species of this genus.

Especially wanted are the species: grandiflora, fendleri, crassifolia, missouriensis, minima, also several other species.

This genus is commonly known as the Ground Cherry or Husk Tomato.

Either write us direct or Miss Margaret Young of the Blandy Experimental Farm, University of Virginia, Boyce, Va.

or two. We make great pains, however, not to list anything that cannot be sent, its a costly listing.

Pansy and Delphinium seed: usually Pansy seeds germinate with little trouble but with Delphiniums it is different. They are not hard to germinate at all if a few precautions are taken, which you will find fully discussed in these pages during the next 2-3 months and before the summer planting starts, but what we wish to mention here is a letter from Harry Sommerfeld of Rockwell City, Iowa, in which he says, "The Pansy and Delphinium seeds I received last fall, I do believe, every seed grew and they sure came up in due time. I enjoy your catalog so much, also the new kinds of seeds listed." Once in a while someone will write in to the opposite effect and it really is hard to answer them; we find it easy to make a failure of a germination, just a little neglect or oversight will finish the whole seeding.

H. E. Saier

glass jars.

Germinating Flower Seeds

Fall sowings should be delayed until the last possible moment unless it is definitely known that the seed will not germinate within a few weeks, or unless greenhouse facilities are available. Very few plants, other than weeds, can survive a severe freeze unless they have developed considerably beyond the cotyledon stage. Sowings at this time may be made in ctrefully prepared beds in the open, yet there is considerable danger of loss, as some seedlings will appear with the first warm days of spring, and a late cold spell may destroy them entirely. If the seeds are at all rare or precious, they should be sown in a frame so that protection during spring cold snaps is possible. Fall sowing seems almost necessary for satisfactory germination of a few things, particularly Helleborus and Lilium candidum; it is also advisable for species of the Buttercup family especially Anemones, and seeds of trees and shrubs. Penstemons will probably germinate better from fall sowing, yet results from early spring sowing have shown that most species do not require the long spell usually assumed to be necesary.

Winter sowing, that is, during the months when the ground is frozen, need be resorted to only in the case of late arival of the few kinds of seed that should have been sown in fall. It will probably be necessary to sow these seeds in pots or flats, after which they should be set in the open, or in a cold shed, for the remainder of the winter.

Very early spring, that is, the first mild days, seems to be the best time for sowing seed of most hardy perennials, and especially of alpines. Here, where at least occasional freezes, and an occasional snow, can be expected into early May, I make most sowings during the last two weeks of March. All sowings at this time are made in pots or flats, or in a cold frame if available; open ground sowings before the middle of April have rarely been successful. For a milder climate than that of central New York, the dates may be advanced considerably. The idea is to assure the seeds of at least a month of cool to cold weather before germination is desired. Most rock garden plants require at least this brief cold treatment, and few seem to object to it. Crucifers, composites, Geraniums, and Erodiums are as well off, at least, if not sown until several weeks later, when mild weather can be expected. Primula auricula and Sempervivums wil not germinate well without this brief cold treatment, and late sowings of these two will not come up till the following

Winter covering of seed pans with snow seems rather ineffective. I have spent many hours shovelling snow over pots that had been sown in fall, or had failed to germinate the previous spring, without seeing appreciable improvement in germination. On the other hand, if the seed beds or pots are exposed to late spring snow flurries, seed will germinate as if by magic almost as soon as the snow melts. Better results have been obtained when the frames were covered by hotbed sash as soon as the now had stopped fall-

Freezing of seeds in the refrigerator (some gardeners freeze them into the center of ice cubes) is an alternative treatment that gives good results. At present too little is known of the proper time the seeds should remain in the refrigerator, with periods from a week to more than a month being recommended. Experiments are also being made with deep freeze treatment, but I feel that such extremely low temperautres will prove unnecessary, and perhaps even harmful. Pouring hot water over seeds, especially of Primulas, has proved successful in some The entire Sweet Marjoram cases (results here, with controls, plant is harvested, hung up in have shown nothing advantageous mediately after drying in tight no definite temperature is ever given, but apparently 125 to 150 varieties are best for drying.

The Lily Of The Incas

Along the slopes of the mighty Andes, and near the sea at their base, is found a race of Amaryllis relatives known as Alstroemeria. Popular fancy has linked their name with that of the Incas who once lived there ,and today, it is said, these flowers are used to adorn Catholic shrines. Years ago I met many of them in the Chilean foothills, sometimes at the very edge of the sea. The flowers entranced me, but I felt them utterly useless for my cold windswept garden, for there seemed no way to compensate here for the burning sun and scanty rainfall of the nitrate deserts of northern Chile.

Last spring a generous friend sent a number of roots of Alstroemeria aurantiaca, which were planted on the east side of an enormous lilac-with no little mismiving, yet with the hope that they might flower once. Last spring was the most devastating I have ever experienced, after an abnormally cold winter, and fully hardy plants which had never caused me the slightest difficulty succumbed, including many within a few feet of thesensitive Alstroemeria, which was protected by only a few inches of straw. Spring came, and as. I expected, there was no sign of life in the alstroemeria bed; then, one day, a few spears of green, and at last in July, flowers. These, produced in large clusters fro a couple of months, were tawny orange in color, with six rather irregularly shaped petals curving somewhat in the shape of a gigantic parrotbeak. They were born on stiff upright stems of more than three feet, set with rather short and narrow grass-life leaves.

The flowers and habit of all the Alstroemerias, with the exception of a few tender climbers more correctly known as Bomarea, are similar, but they range in color through pink, blood-red, and violet, with a host of subtle intermediate shades. A. chiloensis should be at least as hardy as A. aurantiaca, while A. ligtu is reported more tender. As for the almost legendary A. violacea, just now beginning to appear in lists, I was so disappointed in its color, when at last we found it on the fog-bathed Morro de Copiapo, that I'm willing to let someone else search it out. It is, I must admit, lovely in its soft violet and gold markings, but so far from the glowing violet of descriptions, that I have never forgiven the plant the labor and travel its finding cost us.

Alstroemerias probably like a rather light sandy soil, and at least some species will appreciate a fertilizer rich in nitrates, while most will prosper in the driest, most sunny position you can find. However, do they need it? My plants are growing in ordinary garden loam, in an east exposure, sheltered from west winds, and seem to be increasing mightily.

Fall sowing of seeds seems best, and preferably this should be in a cold frame. Even for the experts, however, germination is never very gerenous, and one should be content with a few plants from a packet of seed.

degrees is indicated.

Some few spices seem to require not one, but a series of call a ells before they will germinate, and ungerminated sowings should be left undisturbed over two years at least. It is quite possible, however, that ripeness or after-treatment of the seeds in question, rather than an inherent charac-er, is responsible for this long delay. I am informed by a German specialist that most androsaces will not germinate in less than one or two years, yet an occasional seedling has appeared from my sowings within a few weeks. One simply cannot be arbitary on the matter of germination!

(Continued on Page 23)

Dry parsley in the regular way small bundles and dried, store im- in this method on certain species); and as soon as dried store in tight glass jars. The plain leaved

Ordering-Important

First be sure to print your name and address. We get hundreds of letters every week of which it is impossible to make out

Remit in checks, money orders or, at your risk, in cash. We did not have a single cash remittance lost last year, but it could happen. Orders amounting to 25c you can remit in 1c stamps; 25c - 50c in 3c stamps; 50c - 95c in 5c or 10c stamps, but over this amount do not send stamps, please. Michigan customers please add their 3% sales tax. Don't forget.

Orders for seeds, bulbs, plants, etc., are not mailed in one package. Seeds usually go out by return mail and are not acknowledged, but if there is any delay in shipping you will receive an acknowledgement.

On Flower Seeds there is a key-number just before the price. To save you a lot of writing just use the symbol. It is short and

Methods of Germinating Primulas Rare Species by Florence Levy

With the discovery of simple during treatment. Seeds may be methods of pre-treating Primrose allowed to freeze for months if seed, older seed can be germinated as easily as fresh over hows the theory that Primrose seed loses its viability quickly. On the contrary, Primrose seed retains its germinating powers natural frost action is the prinlonger than soft-coated seeds, requiring only penetration of the ever-hardening outer seed coat.

The seed coat of fresh seed is warm and moist conditions. As seed ages, the seed coat-or protective cover.ng-harders with the diminishing water content, and with this reduction of natura! young plant within the seed is toward partial and finally entire dormancy. The hardened seed coat then seems impervious to water, the absorption of which is a necessary preliminary to germina-tion. Consequently the removal, softening or rupturing of the outer covering removes the obstacle in the path of quick germination

Primrose seed can be sown in post summer, late fall, winter, and Sawdust from broadleafed trees, spring. It should be pre-treated alder, oak, maple, elm, is very only when sowing from late winter through the spring months to bring on germination with warming temperatures and after danger of hard freeze is past. Three simple methods of pre-treating seeds are freezing, scarifying and ture open. the use of hot water. Of these methods, the hot water treatment is quick and effective with the majority of varieties and requires no advance preparation. Freezing is also efficient and safe but requires a period of waiting, which is sometimes desirable. Scarifying the removal of the seed coat by abrasion, requires sandpaper which is not usually at hand and which, if used, can quickly pene-trate beyond the outer covering and injure the germ within Therefore, only the hot water and freezing methods, and a combination of the two for the more stubborn types, will be outlined.

Hot Water Method: For use in

late winter and spring. After seeds are sowed and firmed into the soil or other seeding material, sprinkle thoroughly with water that is very hot but not burning to the hand. Temperatures between 115-120 degrees—using an ordinary thermometer for testing temperature of water-are safe and efficint. Cover with pane of glass or glassine. Seeds need not be covered with soil. A very light sprinkling of sand can be used to keep the seed from rolling if desired. Repeat the hot water treatment the next day at a temperature of from 115-120 degrees after which tepid water may be used when and if watering is necessary before germination. A simple wawith laundry sprinkler attach-

Remove the glass covering when germination begins and sift a fine layer of sand over the top. Thereafter use cold water for thorough waterings, or stand pot or flat in water until soaked. Avoid frequent and light sprinklings after germination has start-

Artificial Freezing: For use in late fall, winter and spring. Hardy Primroses, or Primulas to use the correct term, are cold climate and alpine plants, the seeds being accustomed to periods of freezing and thawing in their native environments. This can be duplicated artificially in the refrigerator, or naturally by sowing in the late fall and allowing the elements to dtioi ETAOI the elements to do it. To freeze artificially, place a few dops of water on the seeds in the packet, stir until massed together, fasten packet securely, wrap in waxed paper as insurance against spilling, and place in freezing unit.

A ten-day treatment with four or five thaw periods of not more than a few hours each will no-

sowing is not immdiately conven-Thaw occasionally, when thought of, and before replacing in freezing unit add enough water to mass together. Duplication of ciple involved.

Artificial Freezing and Hot Water: For use in late wilnter and spring on slower-germinating na u ally softer than older seeds, types such as Asiatic Primulas moisture content being at the and Juliana hybrids. (All others maximum, therefore the ease with including Auriculas, respond to which fresh seeds germinate under one treatment or the other and have not been experimented with in this way.) Freeze artificially for a ten-day or two-week period, or longer, then use two applications of hot water, 115-120 demoisture the tendency of the grees, as outlined under that heading. P. rosea, a notoriously difficult species to germinate when aged, sprouts like grass within a few weeks using this combined treatment.

PLANTING INSTRUCTIONS

Seeding Mediums: For those who prefer soil, equal parts of candy loam and leaf moid screen ed and mixed is a standard com-

Sawdust from broadleafed trees, ALSTROMERIA ligtu hybrids satisfactory. It can usually be obtained from small mills or furni- ANTHERICUM liliago ture factories. Put sawdust in a sack and soak thoroughly in hot AQUILEGIA canadensis water. The addition of coarse sand is advantageous to keep the tex- ARABIS blepharophylla

Drainage: A layer of coarse drainage material should be placed ASTER aplinus in bottom of aflts or pots leaving drainage holes unobstructed.

Seeding: Over the drainage material place soil or sawdust, level CAMPANULA incurva off, tamp down gently and water thoroughly. Sow seeds thinly for rapid development and good air CLEMATIS macropetala circulation. Either broadcast or sow in rows, the later method allowing cultivation between the CROCUS aureus drills with a kitchen fork aeration and growth. Slightly depress the compost or sawdust into rows 1/2-1 inch wide and gently firm seeds before watering in. Remember: Sow thinly.

Covering Seeds: Seeds need no soil covering but if used, barely cover with sand or very fine soil. Deep sowing checks germination. A glass pane or glassine covering placed over the container is all that is necessary. Moisture condenses on the glass and keeps the seeds uniformly moist. Remove when germination begins and sift lightly with sand.

Watering: Water freshly ripened seeds with tepid water, or at 160 degrees once only. See Hot Water Method when sowing in late winter and spring. After seedlings appear, avoid light and frequent sprinklings which brings on damp-off. Placing the container in hot waterly:,

er in water for a thorough wateris the best method. Sink the container, in a pot, in moist soil or sand in shady, protected place to maintain uniform moisture.

Protection: Seeds and young seedlings should be kept from later morning and afternoon sun, heavy showers, and safeguarded from birds and pests. Air circulation should always be good.

Pest and Fungus Control: Damp-off and aphids are best controlled by prevention. Regular dusting several times a month with a good fungicide-insecticide from the time germination begins until placed in permanent positions will usually keep your seedlings vigorous and healthy. There are many good products on the market, Spra-Dusto, the first one tried at Barnhaven, was found safe and effective. The fermate and sulphur in Spra-Dusto controls fungus and the 5% DDT, rotenone and pyrethrum kills insects and other pests. Use any inexpensive duster, being sure the surface of the soil or seeding medium is treated and the underside of foliage dusted.

Nutrients: When growing in mediums other than soil, nutrients are often used. We have found ticeably speed germination, Make Plant-Chem Salts a safe and comcertain seeds are always moist plete plant food which also in- ed against aphids.

Of Flower Seeds

There are some 200 additions in -innominaka this issue, mostly seeds of rare -laevigata species and during the next month -milesii or two, there will be added close -reticulata to 1,000 others. Seeds that are -rubro-marginata now on their way but too late for classification in this issue are: -ruthenica _straussii AGAPANTHUS mooreanus nanus -tectorum ACONITUM wilsoni, var. Barker -vicaria DIERAMA pulcherrimum EUCRYPHIA lucida lish grown stock) HESPERANTHA bukrii LEWISIA howelli HOMERIA comptoni KNIPHOFIA nelsoni LILIUM centi-gale LILIUM willmottiae -martagon (English Selection) LINUMnarbonense "Peto" IRIS milesii -salsctoides nanum HYPERICUM chinense LYCHNIS alpina PRIMULA smithiana -floscuculi THALICTRUM dipterocarpum -haageana RHODODENDRON tephropeplum MUSCARI ajureum MATHIOLA bragginsii latifrolium GLADIOLUS prim. "Souvenir" NARCISSUS moschatus albus LILIUM candidum Salonika ONIPHALODES cappadocia NARCISSUS bulbocodium OROBUS vernus NOTHOLERION thompsoninnum POLEMONIUM panciflorum CODONOPSIS clematidea POTENTILLA pygmaea CLEMATIS macropetala PRIMULA florindae ACONITUM lycoctonum PUSCHKINIA libanotica -volubile ROSA farreri AETHIONEMA theodorum SCABIOSA pterscephala ALLIUM farreri SCHIEVERECKIA podoica -pulchellum SENECIO doronicum -sphaerocephalum SILENE alpestris -armeria ALYYSSUM scrpyllifolium -schafta ANEMONE lesseri -veseliaca bosnaica SISYRINCHIUM augutfolium -ramosum —bermudianum SYMPHYANDRA wanneri -glandulosa TOWSENDIA exscarpa TRILLIUM erythrocarpum ARMERIA alpina -grandiflorum ASPHODELINE luteus TRITELIA iniflora
TROLLIUS europeus (orange and -farreri CALCEOLARIA crenatifolia yellow) -ledabourii CAMASSIA esculeata TULIPA biflora -punctata -trachelium album

CREPIS incana -chrysanthus -fleischeri -speciosus -tommasinianus CYDONIA cathayersis -maulei -sargentii -simonii CYTISUS decumbens DELPHINIUM sinense DIANTHUS proliferus DIGITALIS lutea DIPLARRHENA morea DRYAS octopetala ECCREMOCARPUS scabei EDRAIANTHUS circinatus

COLCHINUM giganteum,

ERINUS alpinus ERYTHRONIUM californicum -orgeonum -revolutum johnstoni FRANKLENIA laevis GALANTHUS elwesii GENISTA delphinensis GENTIANA acaulis septemfida

GERANIUM sanguineum tancastriense HELLEBORUS corsicus

-orientale HIERACIUM villosum

cludes trace elements and hormones. Reduce strength when using on seeds and newly germinated seedlings.

Transplanting: _Seedlings _are ready for transplanting to a richer compost when the first true leaf develops. If more growth is desired before transplanting, seedlings can remain longer in the seeding medium if seed was sown thinly enough for proper development. Compost may be a combination of any number of materials but should contain a good supply of coarse sand for quick drainage and enough peat or like material for porosity. Either screened rotted wood, leaf soil or good loam or combinations of these materials should be added to the coarse sand and peat. The further addition of old screened barnyard fertilizer promotes quick and vigorous growth. Do not use chemical fertilizers. A nutrient such as mentioned above is safe. Keep transplanted seedlings moist and dustHYACINTHUS amethystinus al- -eichleri INCARVILLEA grandiflora brevipes

-cristata

IRIS bucharica

-clarki

-Germanica Hybrids (some Eng-

-kaufmanniana mixed VIOLA biflora

The list could be added to by over 200 species from South Rhodesia, which included seeds of many rare bulbous plants as well as trees and shrubs of great val-

The quantities in many of these offering is rather small, in a few cases, only a very few packets, those wishing any of the above should reserve them now. Price per packet, 50c.

VEGETABLE SEEDS: Due to lack of space in this issue, the complete list of vegetable seeds will be ready the early part of December and published in a separate list.

NOTE: We have not had time to check the spelling or to make proper corrections in the above list as it goes to press at the very last minute, therefore allow for a misspelled word here and there.

South Rhodesian

(Continued from Page 20) CRATAEGUS coccinea DAIS cotinifolia DOMBEYA masperi DURANTE plumeri BYSCHORISPE thunbergiflora ERIOGONUM giganteum ERYTHRINA indica -humeana ERANPHEMUM nervosum EUCALYPTUS caesea -ficifolia -cracis -rosea -torquata EUPHORBIA pulcherrina -splendens GALPHINIA glauca GAIBENIA-florida GLIRIDA maculata GREVILLEA banksii HELICHRYSUM cordatum

SQUASH and PUMPKIN

Squash and pumpkin varieties as perhaps is well known, can be placed in three definite, distinct families. The writer has often thought, and indeed wished that these three families could go under one name, in other words, call all pumpkins or all squash, or vice versa, but long usage is such that it would not be advisable, nor wise or indeed possible.

versa, but long usage is such that it would not be advisable, nor wise or indeed, possible.

The three definite, distinct families into which squash and pumpkin are divided are, CUCURBITA PEPO, to which belong the following pumpkins: SMALL, SUGAR, CONNECTICUT FIELD, WINTER LUXURY, and in SQUASH, roughly the entire list of Summer Squashes, such as the WHITE BUSH SCALLOPS, the EARLY GOLDEN CROOKNECK, the various COCOZELLE and ZUCCHINI types, the TABLE QUEENS, all of the STRAIGHTNECK varieties, the FORDHOOKS and all of the VEGETABLE MARROWS. Strictly speaking then all varieties of the Summer Squash could be called speaking then, all varieties of the Summer Squash could be called pumpkins, truthfully.

The second branch or family of squash and pumpkin are known as CUCURBITA MOSCHATA, to which belong all of the various CUSHAWS such as STRIPED, WHITE, GOLDEN, JAPANESE PIE, and TENNESSEE SWEET POTATO, LARGE CHEESE, KENTUCKY FIELD and DICKINSON.

The third family are known as CUCURBITA MAXIMA, and include roughly the so-called Winter Squash, such as BANANAS, all of the HUBBARDS, the GREEN and GOLDEN DELICIOUS, WARREN, KING OF MAMMOTH, and all squashes that are used chiefly when mature or when for winter use, and invariably have running or vining

These three families can be clearly and easily distinguished one from the other. C.PEPO can be distinguished from the other families by the fruit stem being five angled, or having five sharp edges on the stem. Furthermore, the leaves are always sharply serrated and "rough" or ½spiny. The leaves are often mottled with white or gray splotches. The seeds are buff or tan colored mostly.

MAXIMA has a roundish stem that greatly expands at the union with the fruit, and without exception the vines are trailing or running. The leaves are velvety rather than spiny; generally speaking are heart shaped, not deeply cut or serrated. The seeds are large, mostly pure white and highly enamelled, however, some seed such as the BANANAS have brown, highly enamelled seed.

C. MOSCHATA is the most variable of any of the three branches. Roughly, it is closely related to C. PEPO. All C. MOSCHATA have running or trailing habits, the fruit stems are always five sided, leaves are three to five lobed, with whitish blotches and are soft or velvety. Flowers are larger than in the other branches and lemon yellow in color. All varieties in this group are used only when fully mature. The seeds vary in being high enamelled, and also rough or furry.

It is a well known fact that squash and pumpkin are likely the most difficult varieties to keep straight and pure. There is a tendency to cross, each with the other to some extent at great distances, due entirely to the work of insects. However, C. PEPO will not cross with C. MAXIMA, but both C. MAXIMA and C. MOSCHATA cross readily, if pollinated by hand.

Both squash and pumpkin are native to the Americans, and were a prime favorite in pre-historic times, even the blossoms being used as food and rated quite a delicacy, and indeed are to this day to some extent. They are definitely a warm weather plant; hence, thrive to perfection in California. We could report from observations some phenomenal yields from both squash and pumpkins, unbelievable almost.

We do not believe that any family of vegetables has the intricate complex varieties as do squash and pumpkin. Virtually every conceivable color can be found in squash and pumpkin, also size, and shape. One of the prime favorites in South Africa for instance is a C. PEPO no larger than an ordinary orange. Then again, we have the hundred weight C. MAXIMA that easily will attain a weight of 100 lbs. Then, we have every size and shape and color in between we do believe.

Unquestionably, the food value of all three is very high. The small fruits of C. PEPO, with the embryo seed constitutes a very nutritious dish, whereas, the C. MAXIMA, capable of storage for many, many month, constitutes an important food item in many areas.

German Letter

(Continued from Page 1)

very slowly. About 3000 varieties of flowers from all countries of the world are assembled here as if they would meet for an international fair. As we are not allowed to import flower seeds, we started this year to growing import-crops such as Statices, Zinnias, Cosmos, Centaurea moschatas, Ipomoea Heavenly Blue and other and they have grown fine up to now. Only our Sweet Peas do not reach the standard of California. Asters, Snapdragons and Marigolds, and the like, are all planted by hand from the seed beds on hundreds of acres, which involves a tremendous amount of hand labor.

In this time of food shortage, Ambassador to poland, will talk the areas, naturally, have been reduced, but one can't get along without flowers. Tobacco is grown on a large scale for us men but our women, their sincere wish, is to have a small flower corner in her garden. We have the cemetery gardeners asking for Pansies, Begonias, Ageratums and other bedding plants; and also huge numbers of worker's gardens which at least has some sun flowers, mixed

This queer old town of Quedlingburg near the Harz mountains suffered no hits during the air raids of the war and I often wonder if the pilots of the thousands of planes that flew by day and by night over these flower fields guessed anything about this silent tribute paid by a peaceful population as a matter of course to British and American botanists and gardeners, as in times of peace?

I remember reading the name "Daybreak" on a label when the sirens of the distant town announced the approach of an air-squadron. Well let us look forward to a new daybreak wihout sirens. We gardeners must think in an international way we are botanists, we have to exchange seeds and plants to get finer crops for the benefit of mankind and to perceive at more frequent intervals "the rainbow in the sky.

The skill and work of the gardener can really create wonders and you need only to compare present day quality of flowers to those of half century ago. Over there a lot of breeding work is also done too, for instance, in the creation of "polyploid" forms, plants that show a double or triple set of chromosomes, the carriers of the factors determining heredity.

Much work along this line is being done here, too. Not every polyploid is a sensation, to be sure, but wide unexplored fields are here left open for the future advancement in horticulture. Each chromosome, as you know, may be described as a "string" of quality determiners or genes - so to speak. And each gene in such a string of chromosomes has its special task in | of the large parks of the Bosporus, the hereditary transmission and in Turkey, who spoke five either in increasing the whol set of languages fluently; he smoked his the aim of the plant breeder is nargileh or water pipe daily and either in increasing the whole set when he became blind in old age chormosomes by drugs or X-ray treatment or to induce an increase of a tree by the touch of the hand of a definite gene of the whole setor to bring about a variation.

Amazing results were practically achieved here in increasing the quality or amount for "scent" and for "size or bloom" to be associated or leashed, as we say here, to "doubleness of blooms". This brot forth the "All-Double" Stocks by Prof. Pappert in Berlin and further developed and propogated by Schreibers, now DSG, at Quedlinburg. Anyone can tell at a glance the double flowering plants by their light green colored foliage, these seedlings giving a 100% double flower, while the dark green foliage seedlings are single flowered. This is a real advance in horticulture which will likely substitute all existing varieties of Stocks by the All-Double strain.

The food problem compells us to use, to the very best advantage, every inch of soil; not only must the plant be improved but also the environment. The chemical elements, which we call here "trace _elements" such as bromine, iodine, etc., if lacking in the soil will affect many plants and surely the well known "wilt-disease" of mankind. Asters is due to this lack of one or more of these trace elements.

Primulas

(Continued from Page 22)

MID-SUMMER SOWING OF FRESH SEED

The seed coat of fresh seed is soft and needs only tepid water to bring on germination. Germination can be induced in only a few days however, by using water 100 degrees once when waterin-in the seeds after sowing. Immerse ordinary thermometer for testing temperature of water.

Fresh seed sown in July should be kept as cool as possible and growing steadily to make husky seedlings for early fall establishment. The one possible difficulty in summer sowing is unsuccessful wintering-over of seedlings. Although hardy, root development ay be insufficient in cmanymay be insufficient in many sections to hold the plant in the ground during freeze and thaw periods. In the Pacific Northwest try to get them to permanent positions not later than September and cover with evergreen boughs during the winter if severe and without snow. In the east and middle west and other areas of colder and earlier winters transplant to cold frames or to flats and store in a cool light room or basement window growing them on during the winter for spring bloom. In coastal California and other mild-winter sections seedling growth continues without protective measures.

In addition to keeping germinating seeds cool during the summer, precautions should be taken against fungus and insects. Note under heading Pest and Fungus Control.

Do not discard containers after removal of seedlings. Many ungerminated seed, and often the best, still remain. When transplanting disturb soil surface as little as possible. Keep containers moist and protected from rain and

These points will not be new to you over there but they will show that gardeners are a large family scattered all over the world and all interested in exchanging their expriences. During my 30 years of gardening. I have met a good many gardeners, hundreds of whom come to see this big seed growing center here, and from every part of the world. If we could not make ourselves fully understood, there was always the latin names for the plants and for the rest we sympathized always in a general way. They were always interested in something "new" in the gardening world. They were plain and open hearted fellows and did not mind a rain, when outdoors or too much sun. I have had a gardener for a friend who had charge of one he could still tell the dry branch and then cut it off. He was my refuge, when I was a boy, this patient excellent man and too, a real educator. By the way, this reminds me of his work shop; they are the same the world over. You will find seed bags with pictures or not, yellow wooden labels, rafia, dried tobacco leaves of their own growing, seed catalogs and their tools on the racks. During inclement weather they will set on a wooden bench with pipe, wet knives, clean bulbs or make up a seed order, which always is one of the great pleasures of the year and they rejoice in selecting all the wonderful new plants for the coming season. When these gardeners arrive at 70 or 80 years, and sturdy fellows they usually are, they still will order and plant trees with the hope of seeing them when grown up and frequent mild spells are to be exof gathering their fruits; optimistic on the whole and not a

And now let me close in the hope that common interests in this beautiful world of ours we live in, will scatter all clouds and contribute a peaceful future for our

pessimist among them.

Yours very truly, W. Schrader

Gesneriaceae

(Continued from Page 1)

growing. Possibly some of our readers, especially in the southern states and California, can belp by telling of a friend, amateur or professional, who grows species of any of the following genera: Niphaea, Dicytra, Naegelia Isoloma, Gesneria, Episcea, - Alloplectus, Columnea, Agalmyla, Trichosporum, Mitraria, Conandron, Codonanthe, Besleria, Acanthonema, Boea, Corytgoloma, Crytantha, Klugia, Lysionotus, Oreocharis, Rhabdothamus, Roettlera, Didissandra.

The family Gesneriaceae is botanically related to the families which include the Trumpet Vine and the Penstemons; its most familiar members are plants forming rather flat rosettes of rather hairy leaves, over which rise relatively short stems bearing large and showy flowers, tubular, trumper-snaped, bell-shaped, or flat, in very pure and brilliant colors. very pure and brilliant colors. There are others which are vines or shrubs, but these seem in general to have smaller and less showy flowers. It is said that, unlike most plant families, members of different genera will cross freely, so that possibilities for the hybridist are almost unlimited; experiments with the group will be interesting, and perhaps very rewarding.

Most, but not all, members of the family come from tropical regions of high humidity, and formerly were supposed to require cultivation in a very warm greenhouse; the success of vast numbers of amateurs with the African Violet, and with Gloxinia, under ordinary conditions of window gardening, is doing much to disprove the necessity of such treatment. Apparently the principal requirements, and the conditions under which any unfamiliar kind should be grown, are those outlined under the description of Saintpaulia; yet Streptocarpus and Gloxinia seedlings are thriving in an exposure and atmosphere which did not satisfy the African Violet, so that some, at least, are far less fussy than had been ex-

It is not generally realized that there are at least two kinds which are fully hardy in the North, if grown in leaf-mold soil in a shady crevice in the rock garden: Ramonda, which looks very much ike the African Violet, and Haberlea, very similar in plant, but with thimble-shaped lavender flowers. Jankaea heldreichii, with leaves covered with silver silk, before the war was so rare that its possessors were plutocrats of the plant world; it was probably hardy, but too precious to risk in the open. Conandron ramindioies, though much less hardy, prospered in a sheltered garden in Syracuse, N. Y. No other of the family, probably, will survive a northern winter.

-Dr. C. R. Worth

Germinating

(Continued from Page 21)

Fall sowing has long been practiced in the case of some hardy annuals, such as larkspur and sweet peas, though in the latter case the risk of rotting must be considerable. Here the idea is to sow so late in fall that the seeds will not germinate at that time, but will appear long before the soil, in spring, is in condition for sowing. Such plants are much sturdier than those from spring sowings, flower earlier, and are in better condition to resist summer heat.

In conclusion, if one has a long cold winter, with much snow on the ground, and few or no thaws till early spring, fall sowing is a safe practice for seeds of almost any hardy plants. If, however, pected, and greenhouse facilities are nnot available, it is far better to delay sowing of most hardy seeds until the first moment in spring when the soil is in fair condition, relying on sufficient cold weather to follow sowing, and far germination to be delayed until the young seedlings will not be subject to heavy frosts. By Dr. C. R. Worth.

TULIP BULBS

by the 1000 are NOT PREPAID. 25 bulbs at 100 bulb price; 250 bulbs at 1000 price, if taken in the variety priced. All bulbs are No. 1 size and of best quality.

DARWIN TULIPS.

We know of no other Tulips so useful for various garden purposes as the Darwins, with their bright colors, their large flowers on long graceful stems and wonderful substance and lasting qualities. Forcing varieties are marked with a) and make the finest material for pot plants and cut flowers from the end of Jan. thru all winter to Easter and Mothers Day .

For the garden border, plant in groups, spacing the bulbs 6" apart and planting about 5" deep according to soil conditions; they can be planted up to freezing weather.

New and Superior Varities:

12c; 100, \$1.30.

FARNCOMBE SANDERS. Fiery rose - scarlet and extra choice for bedding, 30", cannot be recommended too much. Each, 10c; Doz.

GOLDEN AGE. A magnificiently BREEDER TULIPS: formed and beautifully toned old gold that sparkle in the sun; it is one of the handsomest Darwins, 28". Each, 15c; Doz. \$1.20; 100, \$9.00.

NIPHETOS. Ivory - yellow with deep toned interior, yellow anthers, 29", highly recommended. Each, 15c; Doz. \$1.40; 100, \$10.50.

PRINCESS ELISABETH. A lovely rose-pink, a deep color but soft and clear, a graceful flower, 30" Each, 12c; Doz. \$1.30; 100, \$9.00.

SUNKIST. This is the true yellow

Tulip without any variations in shades, blooming a beautiful golden yellow that does not burn or fade in the sun, 300". Each 15c; Doz. \$1.60; 100, \$11.50. COLLECTION BEST VARIETIES. (Our selection). Doz.

COTTAGE TULIPS

\$1.20; 100, \$8.00; 1000, \$60.00.

They are especially garden Tulips and differen from the Darwins mainly in their bright distinct colors and longer and pointed flowers; they bloom about the same time as the Darwins; there a few good forcers amongst them. They make excellent cut flowers.

ALBINO. A pure white and very large flower, a new variety, (*), 22". Each, 15c; Doz. \$1.50; 100,

All prices quoted in quantities GOLDEN HARVEST. A splendid up 100 bulbs of a variety, are post deep lemon yellow, early and paid in the U. S. Quantities quoted showy, 30". Each 15c; Doz. \$1.30; 100, \$9.00. ______

> MRS. JOHN T. SCHEEPERS. Ideal deep yellow, has won highest awards and will become one of the best varieties, 30". Each, 15c; Doz. \$1.50; 100, \$10.00.

TRIUMPH TULIPS:

Hybrids between Darwins and Early Tulips, having a sturdy robust habit; the colors are exceptionally attractive with many bicolors, selfs and some distinctly bordered and edged. While very effective in the garden they are also valuable forcing flowers, especially in pots or pans, coming into flower between the Early and the Darwins.

ALBERIO. Vigorous, large winered flowers distinctly edged in white, outstanding garden variety and fine forcer, 26". Each, 15c; Doz. \$1.25; 100, \$9.00.

CROWN IMPERIAL Lovely shade of red with narrow golden edge. Each, 15c; Doz. \$1.25; 100, \$9.00.

DENBOLA. Dark amaranth - red with broad creamy edge and bluish base; one of the best Triumphs, strong stems, 26". Each, 15c; Doz. \$1.50; 100, \$11.00.

Bloom at same time as Darwins and make a great contrast with them; they are especially desirable for the garden and the colors are more towards art shades. They are very beautiful.

INDIAN CHIEF. Coppery dark red flushed with an overlay of burnished bronze, illuminated by a rosy glow on inner petals, 34". Each, 15c; Doz. \$1.50; 100, \$11.50.

PARROT TULIPS:

They have artistic shapes, deep cut and fringed petals, and very large flowers and are especially valued as cut flowers as grown in the garden. BEST MIXED VARIETIES. Doz.

\$1.35; 100, \$9.50.

TULIP SPECIES:

Species or botanical Tulips include a great number of beautiful and interesting kinds-in all variations of size, structure of leaves, habits, etc., and a number can be planted in the RG or in small nooks. Uerfect drainage and as a rule, 4-8 inches deep.

KAUFMANNIANA. Water Lily Tulip. One of finest botanical tulips, pale primrose. exterior suffused carmine and flaked same color on tips; flowers early in April, 8". Each, 15c; Doz. \$1.25; 100, \$9.00.

EES

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Cenght No. to Wt. per Carton Carton d inch 1000 3 lbs. 6 inch 1000 3¾ lbs. 6 inch 1000 4½ lbs 10 inch 500 2¾ lbs.	Price 100 .50c .55c .60c .70e	Price Carton \$3.41 \$3.59 \$3.92 \$3.03	WS per 1000 UEL TCS TLS LTS
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SPECIAL GARDEN STAKES - 7/8" wide, painted white, all prices prepaid. 8 inch 250 2¾ lbs. 250 3½ lbs. \$2.28 WWS 10 inch \$2.66

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COPPER WIRED TREE LABELS - painted white, 5/8" wide, Prepaid 3½ inch 1000 3¾ lbs. .50c \$4.08 TOS Wholesale prices are for full cartons, none broken, and prices are NOT PREPAID; if wanted by parcel post add postage. On retail orders where above items are included in a "Not Prepaid" shipment, postage

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Of special use for seed beds, for cuttings and in potting soil. All retail prices are post paid, postage will be allowed where shipped in collect shipments; wholesale prices are NOT prepaid.

6 pkgs. to Paper Carton, T.FE 2 bushel package. 12 lbs.

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